

# MOTOR TREND

**MT SELECTS**  
**The BEST BUYS**  
**in IMPORTED CARS**



**VOLKSWAGEN—THE BEST BUY?**

**DETROIT VS REUTHER: "Share the profits?"**  
**MOTOR TREND INTERVIEWS INDUSTRY AND LABOR ON THIS VITAL ISSUE**

- ✓ From \$1600 Up
- ✓ What Each Offers
- ✓ How They Compare
- ✓ What's For You

see page 24

**SAM HANKS**

tells why "Today's  
cars are not  
safe enough!"

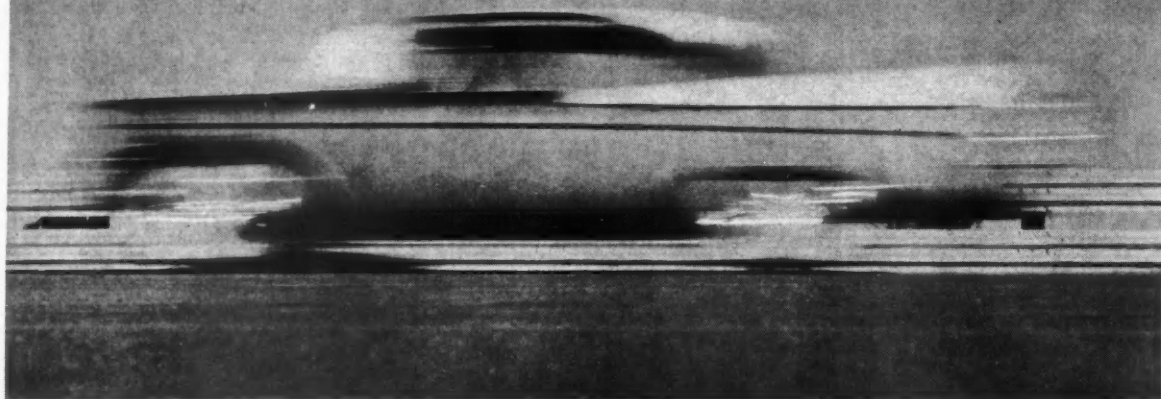


**CANDY-APPLE  
CUSTOMS**

by the  
man who  
paints them  
**ALL RED!**

page 44

# ANOTHER TOUGH COMPETITIVE TEST... AND DODGE PURSUITS WIN AGAIN!



## California Highway Patrol orders 287 more

They don't fool—those California Highway Patrol officials. To sell them a fleet of cars that must cover some of the toughest terrain in the land, you've got to prove what those cars can *do*—and *take*.

In a recent test, the new '58 Dodge competed with four other makes for acceleration, top speed, braking, handling ease and stability. As a result of these demonstrations, Dodge was awarded an order for 287 more Pursuits to join a larger Dodge fleet already in service there. Here are some of the highlights of this test:

**ACCELERATION**—In a quarter-mile run from a standing start, Dodge topped the field by attaining a speed of 85.41 mph.

**BRAKING**—The Dodge average for three "panic" stops from 60 mph. was 125 feet. Other makes required 157, 169, 193 and 223 feet.

**"FADE"**—Dodge withstood eight fast stops from 60 mph. without developing "fade."

Tests like these, plus the many *standard* heavy duty features and highly desirable Dodge "exclusives" like Torsion-Aire Ride and Total-Contact Brakes, have put Dodge Pursuits in the service of many Law Enforcement organizations.

Your local Dodge dealer will be happy to let you take the wheel and compare the 1958 Dodge with your present equipment.



*Built and Powered for Law Enforcement Work*

SWEPT-WING 58 *Dodge* PURSUIT



(If your problems are gas waste, flooding, dying, hard starting and poor performance, it will pay you to read this Mileage Minder ad)  
**NEW IMPROVED!**

# MILEAGE MINDER

**WITH MAGNETIC TROUBLE TRAP  
 SAVES GAS—IMPROVES  
 POWER AND PERFORMANCE  
 IN NEW OR OLD CAR!**

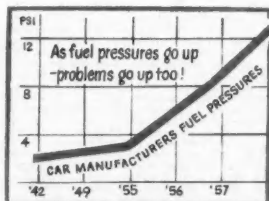
- Read Here How the New Improved Mileage Minder Unconditionally Guarantees More Power, Better Performance, Greater Gas Mileage.

Most of the troubles that plague modern cars are directly traceable to the fuel system. As motors have become more and more compact and complicated, the demands of the fuel system have become greater and greater. Fuel pumps and carburetors have also become more complicated and delicate. The fuel pump advances the gasoline from the gas tank to the carburetor in pulsating surges created by the cam action of the pump. In turn, the carburetor admits gasoline through a brass orifice, which is opened and closed by a steel needle, which is controlled by the action of a float-bowl.

## More Complex Cars . . . More Problems

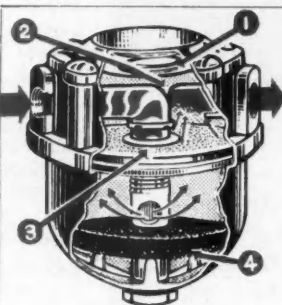
In early engines, when fuel pressures were low and engines far less complex, the problem was not nearly so serious because we simply didn't expect the same performance that we do now.

Now, however, automotive fuel systems have become extremely complex, expensive and as delicate as a Swiss watch. Fuel system pressures have increased to the point that many cars demand fuel pressures of six, seven and even eight pounds per inch, where before only two pounds or even less were required.



These extreme pressures are necessary for the performance of the engine, BUT what has happened is this: the fuel pump hammers the gasoline in pulsating surges, at pressures five or six times higher than before. The impact of these pressure thrusts has become so violent an audible knock is often heard.

Furthermore, modern engines demand absolutely clean gasoline — without mineral or metallic impurities—so that there can be no clogging of the carburetor.



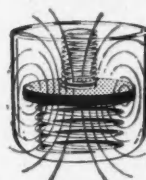
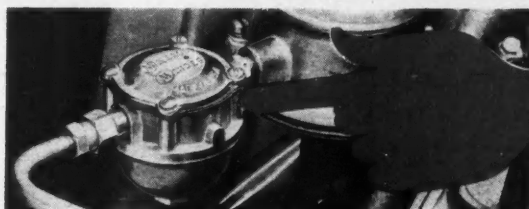
## New Mileage Minder Has The Answer

Mileage Minder is a combination pressure regulator, pulsation dampener and fuel purifier, which perfectly meets the conditions that are causing the trouble.

① Mileage Minder contains a dual neoprene diaphragm (U.S. Patent No. 2544289) which is spring-supported and acts as a pressure storage chamber; cushions the impact of the gasoline as it comes from the fuel pump; then passes fuel on to the carburetor in a smooth, even flow. Mileage Minder does not reduce fuel pressure. Instead it smooths it out at the proper pressure for finest and most economical performance.

② Mileage Minder's pressure chamber principle positively traps vapor-locking gasses, which cannot pass on through the fuel stream until condensed and liquefied.

③ Mileage Minder contains a sintered bronze fuel filter, which positively removes all dust, dirt and sand, even as fine as .003".



④ Each new Mileage Minder is equipped with a magnetic Trouble Trap (Patents applied for). This feature alone is worth its weight in gas savings. A powerful XH-297 ceramic magnet is positioned directly in the gas stream so that its magnetic field captures and holds all troublesome iron and steel oxides, weld chips, rust flakes, thread shavings or any ferrous metallic particles.

## Quick, Dramatic Results

The results are noticeable in your car at once. They are:

- Better performance, more power and pickup.
- Ends gas waste. Users report savings up to 6 m.p.g.
- Cures flooding, stalling, jerky acceleration, hard starting, gasping.
- Minimizes vapor lock and bad-smelling gas fumes.
- Does not reduce manufacturers' recommended pressures.

## MONEY SAVING NO RISK OFFER

Now it is possible for you to experience the benefits of Mileage Minder on your own car—on a money-back guaranteed basis. If you're not completely satisfied, just return Mileage Minder and your money will be cheerfully refunded. This guarantee applies whether you buy direct or from any service station, car dealer or garage.

If you ordered Mileage Minder and Trouble Trap separately, the cost would be \$8.90. Now you may order your Mileage Minder equipped with magnetic Trouble Trap at a significant saving . . . just \$7.95, complete with fittings for your car. Mileage Minder is easily installed by anyone in just a few minutes, with the simplest of tools.

New Mileage Minder has a compact metal bowl, break-proof and heat-proof. Cover is brilliantly chrome plated, the body golden dichromate.

Remember — Mileage Minder pays for itself in gas savings and improved performance, or your money refunded.

At your automotive supplier or use the money-saving coupon in this ad.

**Today! . . . Mail This Money-Saving  
 No-Risk COUPON!**



Paser Manufacturing Co.  
 533 MT4 Turk Street  
 San Francisco 2, California

Please send Mileage Minder with magnetic Trouble Trap, with satisfaction guaranteed. (Quickly pays for itself or money refunded.)

I enclose cash \_\_\_\_\_ check \_\_\_\_\_ money order \_\_\_\_\_ for **\$7.95**  
 (Special, quick-action offer includes postage)

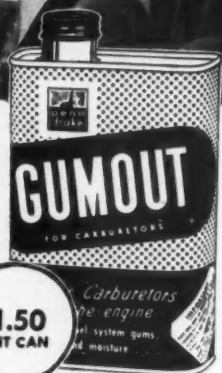
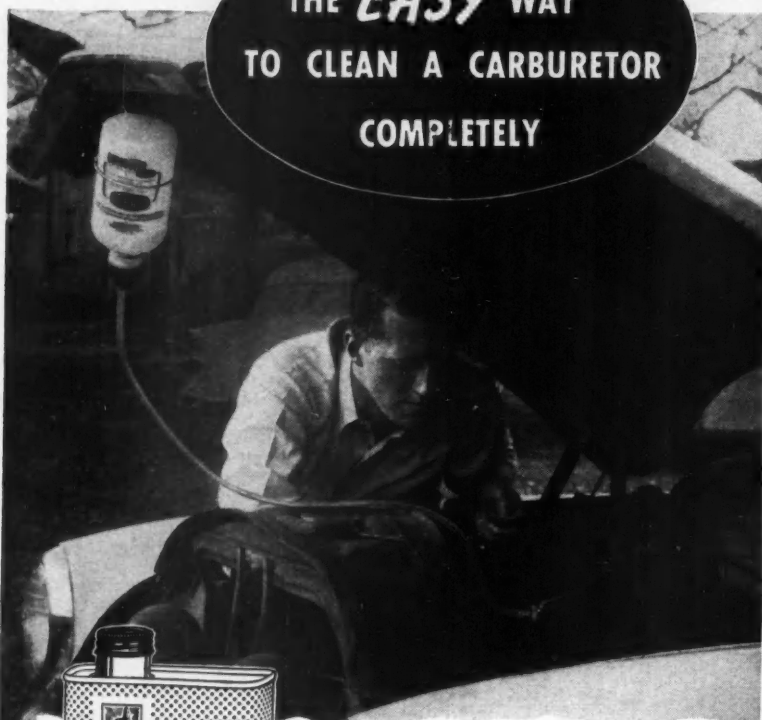
Name \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_

Make, year and model of car \_\_\_\_\_

THE *EASY* WAY  
TO CLEAN A CARBURETOR  
COMPLETELY



Gum, varnish and dirt accumulate constantly in the carburetor of every car. Regular carburetor cleaning is essential to smooth idling, fast acceleration, full power at all speeds.

With GUMOUT and the easy-to-use GUMOUTER Service Kit you can clean your carburetor completely in

less than 20 minutes—without removing the carburetor from the engine. No other method equals GUMOUT for its speed, efficiency and economy in carburetor cleaning. There's nothing like it!

Get GUMOUT and the GUMOUTER Service Kit from your automotive parts dealer today. If he can't supply you, write GUMOUT DIVISION.

Send for FREE Service Bulletin No. 104—"Rough Idling—Cause and Correction."

**GUMOUT DIVISION**

Pennsylvania Refining Company  
2673 Lisbon Road, Cleveland 4, Ohio



APRIL 1958

M

EDITOR

Walter A. Woron

MANAGING EDITOR

Erwin M. Rosen

DETROIT EDITOR

Joe H. Wherry

ASSOCIATE EDITOR

Robert C. Scollay

CLASSIC CAR EDITOR

Robert J. Gottlieb

ART DIRECTOR

Albert H. Isaacs

ART EDITOR

J. Bryce Gillespie

TECHNICAL ADVISORS

John Booth

D. H. Moreton, O. Zipper

OVERSEAS CORRESPONDENTS

Gordon Wilkins, Günther Molter

PHOTOGRAPHERS

Robert D'Olive

Alfred Palacy, Colin Creitz

PRODUCTION MANAGER

Yvonne Hull

ADVERTISING DIRECTOR

A. M. Benedict

ADVERTISING MANAGER

James Going

ADVERTISING PRODUCTION

Jack Preston, Richard Jones

CIRCULATION MANAGER

Gordon Behn

BUSINESS MANAGER

T. A. Johnson

GENERAL MANAGER

Lee O. Ryan

PUBLISHER

R. E. Petersen



MOTOR TREND, U.S. copyright 1958 by Petersen Publishing Co., 5959 Hollywood Blvd., Los Angeles 28. Phone HOLLYWOOD 2-3261. Second-class mail privileges authorized at Los Angeles, California. Published monthly. Subscription RATE: \$3.50 per year; 2 years—\$6.00. Above rates for U.S., its possessions, Canada; all other countries: one year—\$4.50; 2 years—\$8.00. Single copy 35c. On sale at newsstands throughout the country. CHANGE OF ADDRESS: Three weeks' notice is required. When requesting a change, please name magazine and either furnish an address imprint from a recent issue, or state exactly how label is addressed. Change cannot be made without the old as well as the new address. ADVERTISING: Los Angeles office—5959 Hollywood Blvd., Los Angeles 28. Midwest office—524 Book Bldg., Detroit 21. Phone WOODWARD 3-8660. Chicago office—360 N. Michigan Ave., Chicago 1. Phone FRANKLIN 2-6067. Eastern office—17 E. 48th St., New York 17. Phone PLAZA 1-6690. Closes 25th of 3rd month preceding publication. (See S8D5.) CONTRIBUTIONS: Should be mailed to 5959 Hollywood Blvd., Los Angeles 28. They must be accompanied by return postage and we assume no responsibility for loss or damage thereto. Any material accepted is subject to such revision as is necessary in our sole discretion to meet the requirements of this publication. Upon acceptance, payment will be made at our current rate, which covers all author's and/or contributor's right, title, and interest in and to the material mailed including but not limited to photos, drawings, charts and designs, which shall be considered as text. The act of mailing a manuscript and/or material shall constitute an express warranty by the contributor that the material is original and in no way an infringement upon the rights of others. Printed in U.S.A. by Pacific Press Inc., Los Angeles.

**NEXT MONTH**

'58 Motor Trend Award  
Comparison Test of Two Buicks  
Give Us a Brake, Detroit!

# MOTOR TREND



## THE COVER:

The trend is unmistakably toward foreign cars, as evidenced by interest shown in new Volkswagen. Photo by C. A. Peterson. Joe Castro's candy-apple T-Bird photographed by Frank Ferone.

## CONTENTS

### special

- REUTHER VS DETROIT** . . . . . 17  
How will UAW'S profit-sharing plan affect the general public?
- MOTOR TREND INTERVIEWS SAM HANKS** . . . . . 22  
"Today's cars aren't safe enough," says veteran race driver

### late news

- SPOTLIGHT ON DETROIT** . . . . . 10  
The shape of things to come—GM's electronic guidance device
- NEW FULL-BLOWN PONTIAC** . . . . . 11
- DESIGN CONTEST SPECIFICATIONS CHANGE** . . . . . 21

### cars to come

- CHECK THE CHECKER** . . . . . 40  
Conservative style, sturdy construction, economy challenge Detroit

### foreign cars

- FOREIGN CAR BUYERS GUIDE:**
- \$1500-\$2000 ECONOMY CARS** . . . . . 24
- \$2000-\$3000 PRICE RANGE** . . . . . 32
- SPORTS CARS UNDER \$5000** . . . . . 36
- DRIVING AROUND WITH WALT WORON** . . . . . 60  
Germany—watching them built, then riding in the finished products
- AROUND THE WORLD IN 30 DAYS** . . . . . 74

### classic cars

- DOUBLE-COWL CADDY** . . . . . 50

### custom cars

- CANDY-APPLE CUSTOMIZER** . . . . . 44  
Joe Bailon and his national-award-winning creations
- MEET THE CONQUEST** . . . . . 57  
Many unique features are incorporated in this new Fiberglas body

### motor sports

- PUBLIC PROVING GROUND?** . . . . . 64  
NASCAR initiates new Speedweeks feature—a driving skill contest
- MOTOR SPORTS** . . . . . 66  
Daytona Speedweeks, new world kilometer records, Monte Carlo Rally

### service section

- WHAT'S IN A (TRADE) NAME?** . . . . . 69  
Federal Trade Commission steps in to clarify tire double talk
- FIVE RULES FOR KEEPING NERVES STEADY** . . . . . 70
- WHY STAINLESS STEEL?** . . . . . 71
- QUESTIONS FROM READERS** . . . . . 72

### technical

- PRODUCT USE TEST: MILEAGE-MINDER** . . . . . 78

### departments

- MEMO FROM THE EDITOR** . . . . . 6
- LETTERS** . . . . . 8
- RUMOR MILL** . . . . . 12
- HANDY HINTS** . . . . . 56
- CAR OWNER'S LIBRARY** . . . . . 58
- TRENDS IN NEW PRODUCTS** . . . . . 76
- SELL 'N' SWAP ADS** . . . . . 79

## DRIVE IN SAFETY

**PUT GUTS IN YOUR TIRES!**

**WITH Everlast**

**AUTO TIRE Safety SEAL**

Now Guarantee Positive Protection

**AGAINST:**

PUNCTURES



No Guts!

SLOW LEAKS



No Guts!

RIM LEAKS



No Guts!

THIS AMAZING COMPOUND IS INJECTED INTO THE VALVE STEM OF INNER TUBES AND TUBELESS TIRES WITH AN ORDINARY AIR HOSE AND INSTANTLY SEALS CUTS, SLOW LEAKS, PUNCTURES, TUBE PINCHES. WHEN THE INNER TUBE OR TUBELESS TIRE IS PIERCED BY A NAIL, GLASS OR ANY SHARP OBJECT EVERLAST IMMEDIATELY ADHERES TO THE PUNCTURED AREA PREVENTING THE ESCAPE OF AIR.

**EASY—SAFE**  
**EVERLAST**  
**YOUR OWN**  
**TIRES**



**DO-IT-YOURSELF**  
**SAFETY SEAL**  
**TIRE KIT**  
**\$9.95**

4 CANS & DISPENSER . . . . . ppd.

MOST PUNCTURE-PROOF TIRES COST CLOSE TO \$100.00 PER TIRE. (THAT'S ABOUT \$400.00 PER SET.) NOW YOU CAN GET TRUE PUNCTURE-PROOF PROTECTION FOR YOUR CAR—ALL FOUR TIRES—FOR ONLY \$9.95 PPD.

**Territories Open for Qualified Distributors and Dealers.**

**WRITE TODAY!**

INSURED BY THE WORLD'S LARGEST INSURANCE CO. POSITIVE MONEY-BACK GUARANTEE  
EVERLAST EVER SAFE FEATURES: Low Cost puncture protection . . . Extra Mileage plus economy . . . Added safety at high speeds . . . Preserves inner tubes—Stays soft inside tube and tire—Prevents tire overheating. Does not effect balanced tires.

**EVERLAST SALES CO., Dept. MT-4,**  
1093 Braxton Ave., Room 246, L.A. 24, Calif.

- ☐ PLEASE RUSH FREE SALES INFORMATION AND VOLUME PROFIT STORY ON EVERLAST.
- ☐ PLEASE RUSH EVERLAST DO-IT-YOURSELF KIT AT \$9.95 ppd. IMMEDIATELY. Send check, money order or cash. C.O.D. accepted.
- ☐ Send additional 4 cans for extra car at \$1.00 saving—enclosed check for \$18.90.

NAME \_\_\_\_\_  
ADDRESS \_\_\_\_\_  
CITY \_\_\_\_\_ ZONE \_\_\_\_\_ STATE \_\_\_\_\_

particular  
drivers,  
particularly,  
need  
**AjustOmatic  
Shock Absorbers**



More and more owners of late-model, high-performance automobiles are demanding what only Gabriel AjustOmatic shock absorbers offer: • Freedom to choose the exact ride you want—soft, normal or firm—to suit your driving habits • A new experience in superior stability, control and roadability.

Gabriel AjustOmatics are standard (export) or optional (domestic) on *nine* different makes of U. S. cars in 1958. Thousands of late-model sports cars, station wagons and other automobiles in use today attest their value. If you are dissatisfied with the conventional controls supplied on your present car, switch over. Get the ride you want... get Gabriel AjustOmatics.

The Gabriel Co., Cleveland 15, Ohio

**Gabriel**

**AJUSTOMATIC SHOCK ABSORBERS**

**MEMO**

**from the editor**

**some  
pointed remarks  
on small cars**

**WE COULD USE** all sorts of tired-out cliches like "herculean task," "monumental undertaking," etc. to describe our special feature this month—the Imported Car Buyers Guide. In some respects, such trite phrases would be right, but let it suffice that we went to lots of trouble to provide you with as much valuable information as we could on what we consider to be the "best buys" in imported cars selling between \$1500 and \$5000. For those of you who might be considered potential buyers, we hope you find it informative; for those of you who don't care, well . . . maybe it'll make interesting reading anyway.

Even if you're not interested in buying one of these small imports, you should sometime take a trip across a large city in a Detroit behemoth, then return in a small car. You'll be amazed at the advantage the smaller car gives you in maneuverability through its lesser size. Then there's another point, too—that of greater fuel savings.

Everyone talks of the small cars getting better mileage—from 10 to 20 mpg or more—but few people mention that there's a bonus in the form of the difference between the price of Ethyl (which most Detroit cars need today) and regular (which all but the hot imported sports cars do well on). Take the hypothetical case of a Detroit car getting 15 mpg, using 667 gallons at 30c per gallon for 10,000 miles (the yearly average) vs. a small import getting 25 mpg, using 400 gallons at 27c per gallon for the same distance. The difference in yearly cost is \$92, \$20 of which is because of a fairly usual three-cents-per-gallon disparity between regular and Ethyl.

These are but two of the reasons why we think the small car group will mushroom. In many cases they'll take the places of larger, gas-eating monsters; in others they'll be added to the growing number of two-car families. We're hardly alone in these opinions. Mayor Wagner of New York City has asked Detroit for smaller cars so that there'll be more driving and parking space in congested areas. Aarre K. Lahti, associate professor of design at the University of Michigan, has stated that "Our cars today [are] too large for everyday shopping and commuting . . . The only solution is two cars for the family." Senator Prescott Bush, after finding that the new Senate Building parking lot would now handle only 185 cars instead of the originally-planned 200 in smaller spaces, asked for "smaller, cheaper cars. European imports," he said, "will take over a steadily increasing share of the domestic market."

It certainly seems that two cars for each family—one for shopping and one for highway cruising—is the coming prospect, as has been predicted in these pages many times. You'll be reading more on this in the months to come. Also, in very early issues, you'll be seeing and reading about *new* cars coming from overseas. The "foreign car invasion" is far from over.



**BOTH THE CONTINUED EXPANSION** of the small car market and the growth of the two-car family group may in themselves be a partial solution to cutting down on shopping area congestion. Another way may be in not allowing cars in the downtown districts. An experiment of this type took place last fall in Springfield, Ore. where shoppers could stroll across any street in a 2½-block area. Not only did retail sales rise by 14 per cent, but traffic moving through town on adjacent streets made it three to five minutes quicker than usual.

*Neil R. Brown*



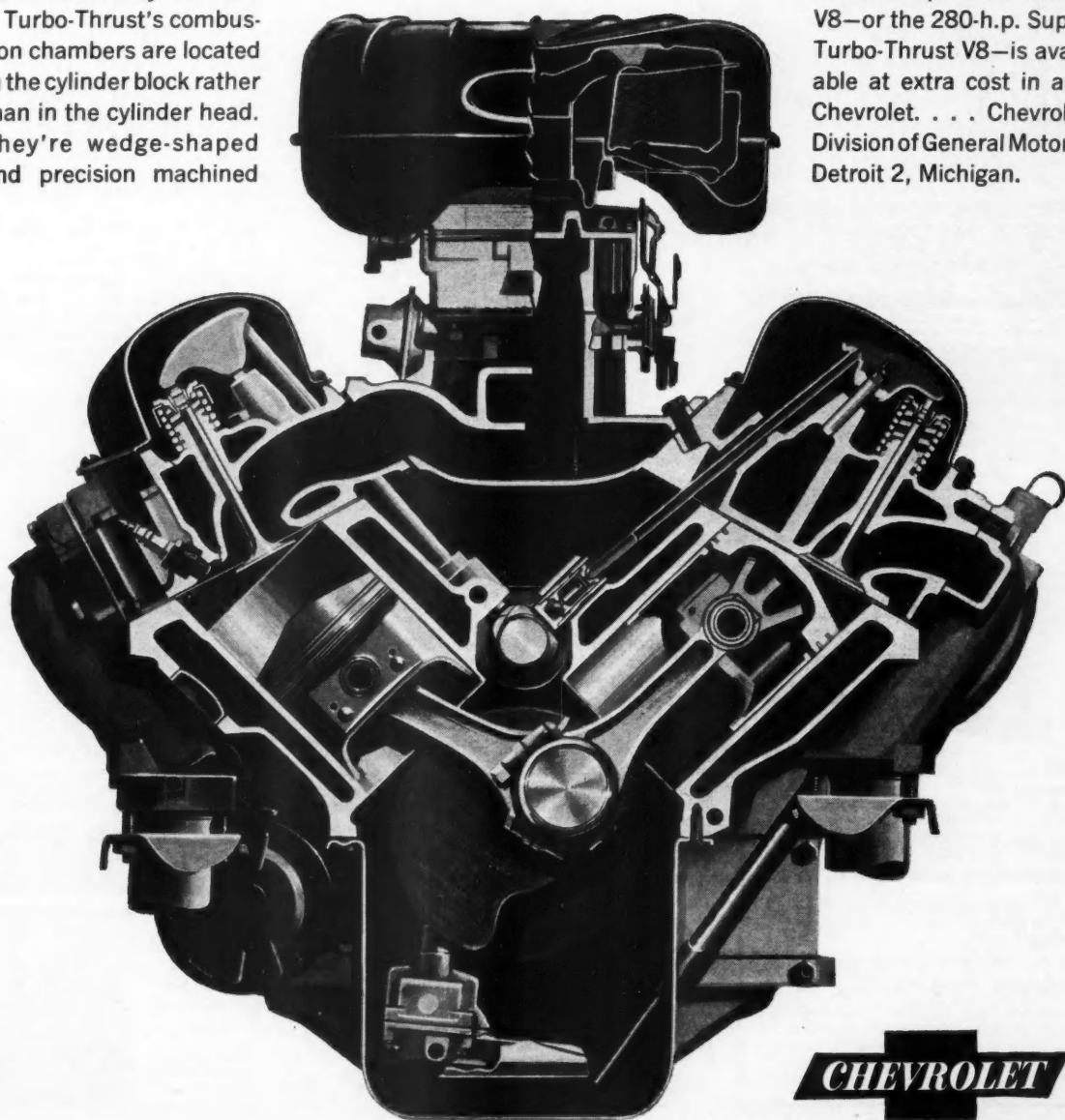
# New in the way it looks...in the way it feels —Chevy's Turbo-Thrust V8!

Here's an engineering achievement you can feel the instant your toe touches the treadle. You feel a new kind of response—an ultra-smooth pickup. And when you lift that Chevrolet hood you'll see why. You'll see an engine so radical it even looks different. It's the Turbo-Thrust V8. It's built around a revolutionary design that contributes to constant smoothness at all engine speeds and to exceptional efficiency as well.

Turbo-Thrust's combustion chambers are located in the cylinder block rather than in the cylinder head. They're wedge-shaped and precision machined

for even, efficient combustion. Since each chamber is precisely the same size, each piston does the same work. The result is a velvet-smooth flow of power from idling speed right on up. A whopping 348 cubic inches of displacement gives you power when you need it—with plenty in reserve. Visit your Chevrolet dealer today. Lift the hood and see the difference . . . take a drive and you'll feel it!

The 250-h.p. Turbo-Thrust V8—or the 280-h.p. Super Turbo-Thrust V8—is available at extra cost in any Chevrolet. . . . Chevrolet Division of General Motors, Detroit 2, Michigan.



# I Will Mail You This \$3.98 MAGNO-ROD FREE!

IT'S TRUE! There are no strings or gimmicks... we simply want to introduce you to the many sensational VALUES in our NEW 1958 CATALOG! You get this \$3.98 MAGNO-ROD absolutely FREE when you write for our new Hi-Performance Directory!

## YOURS FREE! THIS \$3.98 MAGNO-ROD OIL PURIFIER!

This is the famous engine protector you've read about that destroys harmful engine acids... Similar in principle to Canadian Government Development. Users claim it **DOUBLES** engine life... Saves oil, gas, repairs! Effective magnesium catalyst drops inside of oil filter case in seconds! Sold Nationally for \$3.98... Get yours FREE by writing for our New Catalog!

... Hurry! Send for NEW "HOW-TO"



## CATALOG

ALL-NEW Shows world's biggest stock of Hi-POWER Equipment; Mileage-Savers; Safety; Ridding; Racing Parts; Customizing & Dress Up! Accessories—FOR ALL CARS... ALL BRANDS! Lowest Prices Anywhere—20 to 50% Savings! Gives "How-To" Info, Valuable Souping & Customizing Guide! Send only 25¢ to cover postage & handling. Credited on 1st order. (Sorry, only One Catalog & One FREE Magna-Rod to a customer.)

**ALMQUIST ENG.**  
Dept. MTC-4 • MILFORD, PA.

## Floyd Clymer's LATEST

### 1957 OFFICIAL INDIANAPOLIS "500" YEARBOOK



Includes Monza results. This book is larger and more complete than ever before and has more pages inasmuch as it will include a story with photos on the 500 miles Race held at Monza, Italy, in which Indianapolis drivers competed. Hundreds of professional photographs are included and the

book will have more Indianapolis data, regular and technical, than heretofore. ... Postpaid \$2.00

Deluxe Edition, with Fabrioid Binding and gold leaf lettering... Postpaid \$4.00

### HOW TO BUILD A FIBREGLASS CAR

Everything you need to know about Fibreglass bodies, written by experts and fully illustrated with charts and drawings... Postpaid \$1.00

FREE catalog of 200 books

**FLOYD CLYMER, Dept. MT-4**

World's Largest Publisher of Books Relating to Automobiles, Motorcycles, Motor Racing, and Americana

1260 SO. ALVARADO STREET  
LOS ANGELES 6, CALIF.

# LETTERS

## WHY APOLOGIZE?

Dear Mr. Woron:

The point of your apology for the "misleading ad" on "how to avoid radar speed traps" seems a bit misplaced to me.

As far as I can see, the advertiser himself has a literal mind, a sense of humor, and was guilty of no misrepresentation, whereas the individual open to criticism is the one who expected something illegal for his dollar. A speed trap is *not* a mechanical misfortune nor an engineering annoyance to be "avoided" by a gadget or an attachment—unless you consider common sense and consideration to be gadgets, and they aren't selling those for a dollar.

Why don't people learn that they won't get caught doing something wrong as long as they simply don't do something wrong? Amy MacMullan

Reno, Nev.

## IMPALA PICK-UP

Dear Sirs:

I have enjoyed the drawings in your "Letters" section and am sending you my idea of an Impala pick-up. I think that the Chevrolet



Impala is the smartest-looking production car on the market to date, and my admiration for this design led to the drawing.

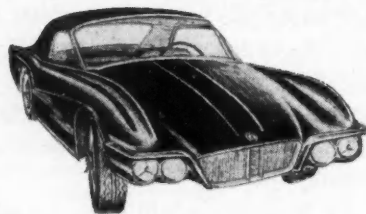
Barry Warner

Portland, Ore.

## THE KEY WORD IS SIMPLICITY

Dear Sirs:

In my opinion the key word in car styling is simplicity. Complexity often ruins a design. For example, compare the '53 Studebaker, a very lovely design, with the '58 Buick or Oldsmobile—two of the worst examples



of car styling to be seen anywhere today, in my opinion.

The Chrysler people are, I think, leading the way with their '57-'58 designs, and their increased sales indicate that the public does not necessarily buy the car with the most chrome and the gaudiest color schemes.

Although my design lacks the professional touch, I believe it shows what I mean.

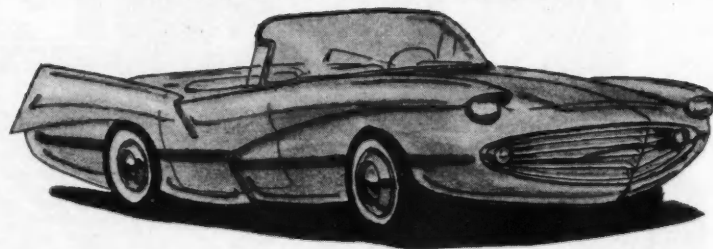
Charles S. Harvey

Aylesbury, Buckinghamshire, England

## UGH!

Gentlemen:

When I saw the cover of your February issue, featuring cars customized with color, my spontaneous reaction was, "Good grief!" (being a man of considerable restraint). I



## À LA EUROPEAN

Dear Sir:

This is probably the way the American auto industry would go if it saw fit to make an honest attempt to capture the sales slot occupied by the European upper-middle-priced sports cars, such as A.C., Jaguar, Mer-

cedes-Benz, etc. It lacks gaudy trim but features sculptured panels, fins and a low silhouette. It would seat two, and feature a large engine (I don't think Detroit will reduce cubic inches) and an improved suspension system.

Tony J. Machowski

Ford City, Pa.

SUBSCRIBE NOW TO

# MT

## MOTOR TREND Subscription Dept.

5959 Hollywood Blvd., Los Angeles 28, Calif.

Please send me MOTOR TREND for:  
(These rates for U.S., its possessions, Canada;  
all other countries: one year \$4.50, two years  
\$8.00.)

NAME \_\_\_\_\_

STREET \_\_\_\_\_

CITY \_\_\_\_\_

ZONE \_\_\_\_\_ STATE \_\_\_\_\_

☐ 1 yr. \$3.50

☐ 2 yrs. \$6.00

Payment enclosed.



then made a tour of our establishment, showing the pictures to our employees.

The responses were as follows: bookkeeper—"Ugh!"; typist—"How horrible!"; service manager—(censored); parts manager—"Only a nut would drive it."

Seriously, would anyone drive such a monstrosity?

E. W. Frandsen North Tarrytown, N.Y.

#### MORE UGH!

Gentlemen:

I read the article, "Splash Your Car with Color," in the February MOTOR TREND. I've never seen anything more idiotic.

There isn't anything that cheapens a car more—stock or customized—than throwing paint all over it. Those could have been beautiful custom cars, but the owners sure spoiled them in a hurry.

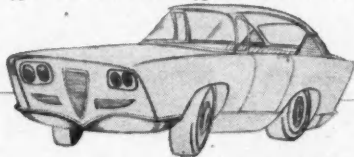
Sven Johnson

Duluth, Minn.

#### AMERICAN VOLKSWAGEN?

Dear Sirs:

Here is my design for a small economy-type automobile. This type of car seems to be



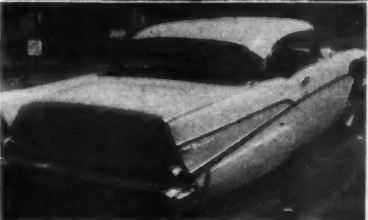
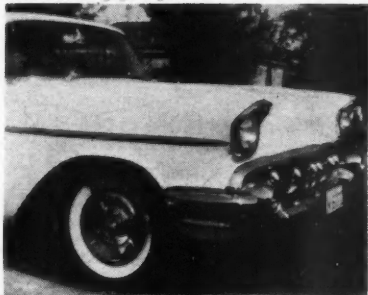
enjoying very much popularity at this time.  
Philip E. Anderson Bellwood, Ill.

#### CHOPPED CHEVY

Dear Sir:

I am enclosing some snapshots of my '57 Chevrolet white two-door hardtop.

It has been shaved in the front and back, and the three small gold vents on each side of the front fenders have been removed. The back has been dropped six inches, and the tailpipes have been extended straight out, with flat tailpipe tips.



The car has Foxcraft skirts with the chrome shaved off and '57 Dodge 500 hubcaps. The grille has six pieces from a '53 DeSoto grille; the park lights are stock '57 Chevrolet.

Glen Williams

Tyler, Tex.

(Note to customizers: If you're real proud of your custom—and have some good photographs—why not send them to us to share with other MOTOR TREND readers? The same goes for classic enthusiasts, too. We'll be pleased to consider them for our enlarged rotogravure section.

**NEW**

## ignition analyzer kit

half the price

of comparable analyzers



MODEL IA-1

**\$59<sup>95</sup>**

SHPG. WT. 20 LBS.

**HEATHKIT**

- easy to build
- locates ignition trouble
- shows adjustments necessary for peak performance

Here is a professional type ignition analyzer in "do-it-yourself" kit form to make your engine service and adjustment work easier. You can do a better job—and do it faster, with this new service tool. Quickly connects to engine to show complete wave cycle of ignition system and reveal troubles in plugs, coil, distributor, condenser, points, timing, etc. Comparable to units selling for more than twice the price. No electronic experience required for successful construction. Kit includes all parts, step-by-step instructions, and large pictorial diagrams. Send for details—or order your ignition analyzer now!

FREE 1958 CATALOG

HEATH COMPANY • BENTON HARBOR 19, MICH.

**D** subsidiary of Daystrom, Inc.



Write for free catalog describing this and many other "do-it-yourself" Heathkits

name \_\_\_\_\_  
address \_\_\_\_\_  
city & zone \_\_\_\_\_  
state \_\_\_\_\_

# SPOTLIGHT

# ON

# DETROIT

by Joe H. Wherry Detroit Editor

**IN A SURPRISE MOVE** GMC unveiled a full-scale electronic guidance system. It consists of two pickup coils, mounted on a Chevrolet's front bumper, and associated mechanisms within the cockpit and under the hood. Briefly, this experimental directional guidance system depends upon magnetic field strength. Any deviation laterally causes a difference in voltage between the pickup coils. The latter feed information into an analogue computer on the dash panel, and the computer then directs the car's steering through a servo system linked to the modified power steering unit. In its present pioneering stage, it does not include a throttle or brake control. The guidance impulses are picked up from a 16-gauge wire imbedded in a 2½-mile circuit.

**WE HAD A CHANCE TO RIDE** in a car equipped with this system. Directional control was fair and gives a foretaste of things to come when you might conceivably enter a superhighway, rent the system, and attach it to your car.



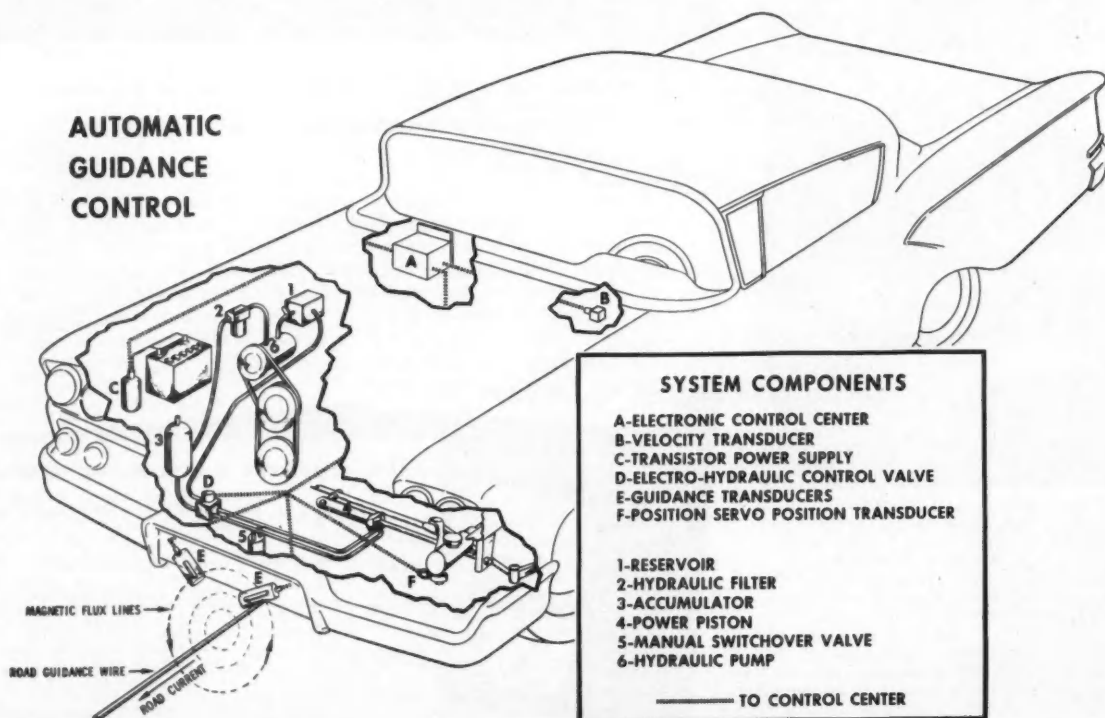
**"NO-HANDS" DRIVING** is promise of GM's electronic system shown below.

Then you'll proceed for long distances with little need to physically control your car. As demonstrated, the system "would cost about that of the average car radio," according to J. B. Bidwell, GM Research Staff, who briefed the assembled automotive press.

**STAINLESS STEEL** is really coming into its own in 1958 for every domestic make is largely forsaking chrome—except on most grilles and all bumpers—for the metal that keeps looking new. For the first time, the Committee of

continued on page 53

## AUTOMATIC GUIDANCE CONTROL





# Pontiac's



## SUPER TEMPEST

**A Hot Cam, 10.5 to 1 Heads, Dual Exhausts, Up to 330 Horses . . .**

**J**UST BEFORE CHRISTMAS rumors were hot and heavy in Detroit: "Pontiac is planning to release an optional powerhouse." "It's good for 150!" "Puts out 360 horses!" "Is being tested in Mexico."

Separating fact from fancy in Detroit is like trying to strain lemon out of lemonade. But here's what we found out in the garages of the motor city, at the factory, and on the beach at Daytona—where the first of the Super Tempest 395-A engines began strutting their stuff.

What the Super Tempest engine(s) amount to are modified units putting out 315 and 330 horses, respectively, through the aid of different heads, a higher lift camshaft, a dual exhaust system, and a few other sundry changes. You can get the two setups on any Pontiac, with just a couple of catches: no power steering, no air conditioning, no air suspension. Reason: no room for accessory pumps because of the new exhaust manifolds.

The way you tell the difference between the two engines is in the factory coding of PK and PM, since they're both called Super Tempest 395-A. If you order a PK, you get one four-throat carb, 10.5 to 1 heads, and 315 hp at 5000 rpm; you'll pay \$254.24 extra on a Chieftain or Super Chief, and \$233.06 on a Star Chief or Bonneville. With a PM you get three two-throat carbs, 10.5 to 1 heads, and 330 hp at 5200 rpm; it'll cost \$330.55 on lower-priced cars, or \$320.35 on upper ones.

You can get either engine with Hydra-Matic, standard stick shift (2.21 first and 1.32 second gears), or an optional Borg-Warner heavy-duty police gearbox (2.49 first and 1.59 second gears) which holds together longer for dragging.

At the factory we cornered Robert Holan, Project Engineer on the engine improvement program. Bob spent a lot of time with us, and detailed just exactly what changes had been made in regular production engines to produce the "A." (This just might give you enough dope to convert your own engine.) The project began, he said, in late '57 when he was told to figure out some easy (and inexpensive) means to gain a horse or two from the 1958 production engine. The first thing he did was check through his parts book to see what was left over from previous years. He picked up the 1957 high-power camshaft (Part No. 524886) and without alteration stuffed it into the 1958 block. This, you may remember, has been beefed up around the crankcase webs (as compared to earlier year blocks) to sit still for high performance. You can take a chance, though, as the same camshaft will fit any Pontiac from '55 on.

Next Bob incorporated a full set of high-ball-travel hydraulic lifters (Part No. 5231615), which will not pump up until slightly after the engine reaches peak rpms. Solid lifters are supposed to be available, but I don't know if from Pontiac or one of the specialty machine shops. Standard 10.0 to 1 compression ratio pistons are specified for the "A" engine as the compression increase comes from head modifications.

The 10.5 to 1 cylinder head is the identical head casting used for all 1958 Pontiacs, with a couple of important changes. As you know, all Pontiac heads are spot milled so combustion chambers are all exactly the same size and free from roughness which might cause hot spots. Bob figured that by milling the 1958 casting on a machine set to mill 1957 heads, he could reduce the combustion chamber depth and thereby increase the compression ratio. After this they were fitted with longer 1957 valves and heavy-duty inner and outer valve springs such as are used in the maximum performance engines. Spring numbers are 524593 and 524598. This completed the head modifications.

Next, attention was given the exhaust system. Pontiac engineers came up with what they term a "Ram Type" dual-exhaust setup, which looks like nothing we've ever seen before. Instead of individual take-offs, as in tubed header installation, the Pontiac manifolds are siamesed partway, then dump into a huge "Y" that gradually tapers to the sewer pipe 2.25 O.D. exhaust pipes. These manifolds can be ordered under part numbers 53961 (RH) and 53965 (LH) if you want to give them a try. One stock muffler is used on each side which gives a nice rumble during engine run-up.

Sum total of the alterations is a nice horsepower increase in the upper end, of which about 70 per cent is credited to the '57 camshaft and the rest to the new exhaust system. Factory dynamometer tests showed more power available through improvements to the exhaust than to the intake, so the "A" engine runs the same intake manifold and carburetors as regular production. Even the jetting and air cleaners are the same. By the way, keep in mind that carburetors and air cleaners are now calibrated as a unit. Change air cleaners—change jets. "A" ignition is strictly stock, although we have been told a dual-breaker unit is available as a factory option.

How well the engine goes was demonstrated to us at Daytona Beach Speedweeks. Vicki Wood (the world's fastest housewife—in a car) had a little Chieftain coupe with a well-broken-in "A" engine. Zero to 60 (with the Borg-Warner stickshift 3.08 gears) was turned in a consistent 7.2 seconds on pavement with a crosswind. Running the famous Daytona Beach Mile, Vicki's car turned 124.224 and 121.704 mph—most disappointing until her husband, Skeeter, discovered that two of the three carburetors were opening only part way. That his findings were not just an excuse for slow times is borne out by other '58 Pontiacs with the "A" engine that cranked out such speeds as: 135.440 (two-way run), 141.844 (one-way), 132.159 (one-way) and a 131.004 (one-way). No doubt about it, it flies.

Another little goodie we bumped into at Daytona was a Pontiac Bonneville Coupe, with the "A" engine and a FOUR-SPEED GEARBOX! This was such a surprise, we accused the owner of installing the four-speed shift pattern plate over a

*continued on page 54*

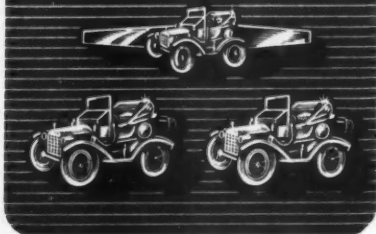
CREATED ESPECIALLY FOR YOU.

# the motorist

CUFF LINKS AND TIE CLIP

BY

**Anson**  
JEWELRY FOR MEN

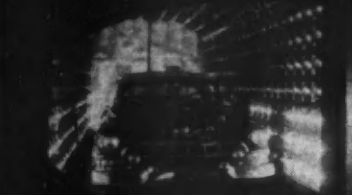


Set \$5.00 Plus Fed. Tax

You'll get lots of mileage out of this unique jewelry set. Wear it everywhere—at rallies, races, to the office. Features authentic reproduction of Model T Ford. A great gift. Your jeweler has it or can get it for you quickly.

anson, Inc., 24 Baker St., Providence 5, R. I.  
In Canada: Anson Canada, Ltd., Toronto

## The World's Finest DEEP GLOSS AUTO PAINTING



**\$49.95**

3 Year Written  
Guarantee.

3M Undercoating

**\$14.95**

Now you can have the world's finest deluxe deep gloss paint job for only \$49.95. (No extra charge for sanding, masking, rust proofing, etc.) Our FORTORIA gold plated 100,000 watt dust-proof even permanently bakes on the paint. You can choose from our 5000 distinctive colors to make your car look new again. We can give you one-day service and arrange convenient terms. Call Infra Red today and you'll be proud of your car tomorrow.

**INFRA RED AUTO PAINTING CO.**  
OUR 2 CONVENIENT LOCATIONS

Los Angeles  
3412 W. Pico  
Republic 44131

Glendale  
6717 San Fernando R. d.  
Citrus 22131



"One of the Big Three is dropping air suspension in its planning for '59 models."

POSSIBLE—But since just two of the Big Three currently employ air suspension optionally, we deem it impossible to say for sure at this writing. Fact is that engineers are striving to overcome the many problems arising from air suspension. That they will succeed is largely proved by the success of air in truck applications.

"The air-cooled engine, with V4 configuration, is under consideration for a new domestic small car."

TRUE—At least according to representatives of the manufacturer of an engine of this type.

"A new type hydro-pneumatic suspension system, under development, completely eliminates plumbing, air compressor, and similar devices."

TRUE—And we have seen this system. This development appears capable of eliminating several common suspension parts, much trouble, etc., while retaining dependability and the much desired automatic leveling of the car.

"A prominent line of pick-up trucks will feature torsional suspension in 1958."

VERY LIKELY—And the line is not the one closest to the torsion systems presently employed.

"One-shot chassis lubrication may be offered, optionally, on low-priced cars in 1959."

TRUE—But we should emphasize the may be since there is no certainty about this worthwhile option at present.

"If Chrysler does market a small imported car, it will be of German manufacture."

ODDS FAVOR THIS RUMOR—But there is no immediate indication of its confirmation.

"Volvo's much rumored sports model with Karmann body will be introduced in the U.S. before June."

FALSE—According to information just received from reliable informants familiar with the Volvo import program, this is not so.

True Rumor's Story... Small Facts Here... True matters in your...



"I RECOMMEND FENTON—THE ONLY NAME YOU HAVE TO KNOW... BECAUSE IT'S BEST!"

**FENTON**

AT LEADING DEALERS  
EVERYWHERE!

BIRMINGHAM—Acme Auto Supply, 2330 3rd Ave., No.  
BIRMINGHAM—Rocco & Cheaters, 316 First Ave. N. E.

ALABAMA

MESA—Eastside Auto Parts  
PHOENIX—Eastside Auto Parts, 2025 East Washington

ARIZONA

GLENDAL—Hank Allen's Muffler City, Valley Auto Accessories, 6235 San Fernando Road  
SAN FRANCISCO—Gene Lockhart "The Muffler Man" 340 10th Street  
SAN JOSE—Kragen's Auto Supply, 138 E. Santa Clara St.  
SANTA MONICA—Guincy Auto Supply, 3003 Wilshire Blvd.  
GRAND AUTO STORES—Oakland, Alameda, Hayward, Berkeley, San Leandro, Richmond, Vallejo, San Jose, Redwood City, San Rafael

CANADA

NEW WESTMINSTER, B.C.—Western Accessories, 315 Columbia St.  
VICTORIA, B.C.—Dickinson & Dunn, 1620 Blanshard Street

COLORADO

COLORADO SPRINGS—Empire Auto Supply, 410 W. Colorado  
DENVER—Jah's Auto Parts Co., 775 Champa Street  
LONGMONT—Charles M. Harris Auto Parts, 919-925 Main

CONNECTICUT

HARTFORD—Kulak Stores, 323 Albany Avenue  
NEW HAVEN—Walters Automotive Distributors, "Warehouse Distributors", 161 Day Street

ILLINOIS

CHICAGO—Admiral Auto Stores, 5958 W. Addison  
CHICAGO—Ray Erickson Speed Serv., 3049 W. Irving Pk. Bivv.  
CHICAGO—Bill Von Esser, 3307 W. Irving Park Blvd.  
CHICAGO—Worshawsky and Company, 1900 S. State St.  
DANVILLE—Fagen Auto Parts, 30 South Hazel Street  
DECATUR—Merry Randolph Motor Supply, 304 E. Wood Street

INDIANA

FORT WAYNE—Helly Distributing Co., RFD 7, Hesse Cassel Rd.  
GARY—C & L Auto Supply, 3688 Broadway  
INDIANAPOLIS—Washington Auto Parts Inc., 2113-19 East Washington Street

IOWA

CEDAR RAPIDS—Rapport Auto Parts, Inc., 630 2nd Ave., S.E.  
DAVENPORT—Strum Auto Supply, 413-15 West Third St.

KANSAS

LAWRENCE—Pippert's Automotive Parts, 211 E. 8th Street  
SALINA—Salina Spring & Axle Service, 672 So. Broadway  
TOPEKA—Gregg Tire Company, 300 W. 6th Street  
WICHITA—Phipps & Sons, 3036 So. Broadway

KENTUCKY

CORBIN—Owens Custom Shop, 302 19th Street

LOUISIANA

BATON ROUGE—Marks Seat Cover Center, 917 Scenic Hwy.  
BATON ROUGE—Muffler Mart, 419 N. 19th Street  
LAKE CHARLES—Marks Seat Cover, 2204 Ryan & 610 Broad  
NEW ORLEANS—Late Model Auto Parts, 2045 Poydros Street

MICHIGAN

DETROIT—The Hot Rod Shop, 8249 Grand River  
LINCOLN PARK—Al's Auto & Glass, 3060 Fort Street

MINNESOTA

MINNEAPOLIS—The Big Wheel Auto Stores, 1418 E. Lake St.

MISSOURI

KANSAS CITY—Sterling Tire & Supply Co., 600 E. 31st St. & 3222 Truman Rd.  
ST. LOUIS—County Auto Parts, 6910 Easton Avenue

NEW JERSEY

CAMDEN—Rem Auto Supply, Cor. 22nd & Federal Streets  
PATERSON—House-Of-Chrome, 187 Paterson Street

NEW MEXICO

ALBUQUERQUE—Ace Auto Supply, 1513 South Fourth St.

OHIO

CLEVELAND—United Home & Auto Supply, 12524-26 St. Clair  
HAMILTON—Rose Auto Supply, 411 S. Second Street

OKLAHOMA

OKLAHOMA CITY—Champion Auto Supply Company, "Warehouse Distributors", 1341-43 West Main Street

OREGON

EUGENE—Pacific Wholesalers, 44 W. 10th Avenue  
PORTLAND—Coast Auto Store, 110 N. W. Broadway

PENNSYLVANIA

HARRISBURG—Chelsea Auto Parts, 26 N. Cameron  
PHILADELPHIA—H. R. Sales Company, "Warehouse Distributors", 1204 West Girard Avenue  
READING—Seward's Speed Shop, 200 Lancaster & 434 N. 6th

TEXAS

AUSTIN—House of Seat Covers & Mufflers, 10th & Lamar  
CORPUS CHRISTI—Muffler Shop, 453 Ayers & 723 N. Brownlee  
DALLAS—Marks the Seat Cover King, 1800 Greenville Avenue  
DENISON—Presley Auto Parts, 905 S. Crockett  
FORT WORTH—Kragen Auto Supply, 5 Stores to Serve You  
HOUSTON—Warren Auto Supply, 5721 Humble Road  
PLAINVIEW—Reed Wrecking Co., 407 Columbia Street

WASHINGTON

BELLINGHAM—Gordon's Auto Parts, 529 State Street  
MT. VERNON—Gordon's Auto Parts, Fourth & Fir  
SEATTLE—Northwest Auto Supply, 410 Elliott W.  
SEATTLE—Schucks Auto Supply, 7 Stores to Serve You  
SPOKANE—Garland Auto Supply Co., N. 3222 Division

SEE YOUR FENTON DEALER!

**TROY RUTTMAN:** Youngest racing driver to ever win the famed Indianapolis "500." Now living in Southern California, he is a confirmed booster of FENTON power and speed equipment.

*Troy Ruttman Says: "Install Fenton Hush-Tone mufflers on your car!"*



## 'HERE'S THE NEW **FENTON** HUSH-TONE MUFFLER'

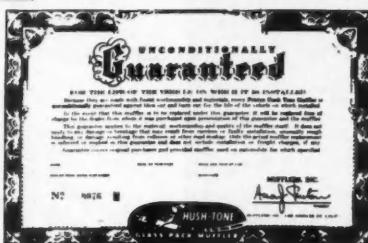
**JUST \$7.95 TO \$9.65**

**It's really quiet and Unconditionally Guaranteed**

"This is the straight-through glass-pack muffler you've heard them talk about — the one that's making automotive history. Only a muffler that was performance-proven over thousands of miles and hours could stand up to an offer like this. Admired by engineers and demanded by smart motorists — it's the one for your car too. A written guarantee goes with every Hush-Tone muffler sold. Every Hush-Tone muffler is guaranteed for the life of the car on which installed.

### PUTS POWER IN — SHUTS NOISE OUT

"Fenton Hush-Tone straight-through mufflers give top efficiency and quiet exhaust-ing because the exclusive double spiral louvre core spins the exhaust gases out of the muffler at a high speed but in a manner that filters out offensive noise.



Hush-Tone gives you power with a purr. And they cost no more than other, less efficient types. See the Fenton Dealer near you now — get Hush-Tone mufflers installed on your car."

### UNCONDITIONAL GUARANTEE

The Fenton guarantee goes with every muffler sold — regardless of your model, age or condition!

### GIVE YOUR CAR THAT SMART "CHROME LOOK"

Here's a chance to dress up your car's appearance with sparkling chrome pipes and accessories. Ask for Fenton outside pipes, lakes plugs and truck stacks.



### WRITE FOR "MOTOR MAGIC" — FREE WHILE THEY LAST

Three nationally known automotive axes reveal tricks of the trade in this colorful, illustrated new Fenton Booklet. Chuck Daigh, Troy Ruttman and Jerry Unser give you the inside story on racing tips, safe driving hints and power pointers.



The only name  
you have to know  
for the finest  
custom equipment.

© Fenton 1957

### FENTON MANUFACTURING COMPANY

3401 East Pico Boulevard  
Los Angeles 23, California Dept: MT 4-58  
Please send me my FREE copy of Motor Magic at once.  
Also included is a special bonus coupon  
for your next Fenton equipment purchase.  
Name \_\_\_\_\_  
Address \_\_\_\_\_  
City \_\_\_\_\_  
State \_\_\_\_\_

There is a FENTON DEALER near you. Check the list shown at left. If your local DEALER is not listed, write for his name and address to FENTON, Los Angeles 23.



# Belond® "500" Mufflers...



New '58 4 passenger  
Ford Thunderbird ... 300 hp.

Exclusive double-wrapped volute case for longer wear—no seam to leak or break.

Heavy interlocked spun heads for complete protection against escaping gases.

Improved fiber glass packing for greater tone perfection.



exclusive  
**SPIRAL CORE\***

Creates a swirling action-thrust for faster, quieter flow of gases—you'll "feel" the difference!

## See your nearest Dealer Soon —

### ALABAMA

- BIRMINGHAM**
- Rocco & Cheater's Speed Shop
- 316 First Ave., North

### ARIZONA

- PHOENIX**
- Dist. to your Dealer by Automotive Parts Whse.
- 515 S. First Street
- Eastside Auto Parts
- 202 E. Washington

### CANADA

- VANCOUVER, B. C.**
- Cat-Van Accessories, Ltd.
- 500 Kingsway

### CALIFORNIA

- CULVER CITY**
- Hedman Muffler & Mfg. Co.
- 11039 W. Washington Blvd.
- Johnston's Muffler Service
- 5641 Corryne Place

### EL CAJON

- Cajon-Tone Muffler Shop
- 1177 E. Main St.

### EL MONTE

- Bill Morse Muffler Service
- 12010 E. Valley Blvd.

### FRESNO

- Dist. to your Dealer by Mfr.'s Warehouse Corp.
- 206 Van Ness Avenue

### GARBERA

- Daniel's Muffler Co.
- 1011 W. El Segundo Blvd.

### GLENDALE

- Accessories, Ltd.
- 1529 Victory Blvd.

### HARBOR CITY

- Peres Muffler Service
- 25919 S. Western Ave.

### HAWTHORNE

- Chuck's Muffler Service
- 12534 Ingewood Ave.

### HAYWARD

- Vic Hubbard's Auto Parts
- 21532 Weekland Avenue

### HERNOSA BEACH

- L & L Muffler Shop
- 904 Pier Avenue

### INGLEWOOD

- Sonny's Muffler Service
- 11124 Hawthorne Blvd.

### LOS ANGELES

- Alax Muffler Service
- 4055 E. Olympic Blvd.
- Deeptone Muffler Co.
- 1915 S. Olive Street
- Mitchell Muffler Co.
- 1299 S. La Brea
- Ted's Auto Parts
- 1486 W. Santa Barbara Ave.

- Dist. to your Dealer by Vogue Automotive
- 3033 S. Grand

### MONROVIA

- GP Muffler & Mfg. Co.
- 152 E. Huntington Drive

### MOUNTAIN VIEW

- Babe's Muffler Service
- 1740 El Camino Real

### NORTHridge

- Gil's Muffler Shop
- 18437 Roscoe Blvd.

- Dist. to your Dealer by C. P. Hunt Co.
- 2406 Webster Street

### OCEANSIDE

- Master's Automotive Sup.
- 208 S. Hill Street

### OXNARD

- Pettigrew Muffler Co.
- 1275 Oxnard Blvd.

### PASADENA

- Mitchell Muffler Co.
- 135 W. Green St.

### REDWOOD CITY

- Muffler Service Co.
- 75 El Camino Real

### SACRAMENTO

- Capitol Speed Shop
- 1620 Broadway

### SAN BERNARDINO

- Scotty's Muffler Service
- Court and "G" Streets

### SAN DIEGO

- All Tone Muffler Shop
- Second & Ash Streets

- Dualtone Muffler Co.
- 2636 India Street

- Sol's Auto Supply
- 840 Market Street

- The Muffler Clinic
- 1379 Folsom Street

- SAN JOSE
- Babe's Muffler Service
- 808 The Alameda

- SAN LUIS OBISPO
- Jack & Jerry's Auto Supply
- 2101 Broad Street

- SANTA ANA
- Sarver Motors
- First & Grand

- SANTA MONICA
- Lee's Auto Parts
- 2323 Lincoln Blvd.

- Quincy Auto Supply
- 3003 Wilshire Blvd.

- SEPULVEDA
- Sepulveda Body & Muffler Shop
- 9016 Sepulveda Blvd.

- TATY
- Tasco Auto Parts
- 306 Center Street

- TORRANCE
- Johnny's Custom Muffler
- 1213 Engracia Street

### VAN NUYS

- R & B Muffler Service
- 14139 Oxnard Street

- VENTURA
- J & L Muffler Shop
- 920 N. Ventura Ave.

- COLORADO
- DENVER
- Jack's Auto Parts
- 775 Champa St.

- Dist. to your Dealer by Motor Parts Warehouse
- 729 Broadway

- DISTRICT OF COLUMBIA
- WASHINGTON
- Strick's Automotive
- 1816 - 14th Street, N.W.

- FLORIDA
- JACKSONVILLE
- King Sales Co.
- 580 College at Roselle

- Distributed by Carparts Whse. Corp.
- 570 College St.

- GEORGIA
- ATLANTA
- American Auto Parts
- 400 Decatur St., S. E.

- HAWAII
- HONOLULU
- Commercial Motors
- 745 Kakaemoku St.

### IDAHO

### BOISE

- Boise Muffler Sales & Serv.
- 312 S. Ninth Street

### ILLINOIS

### CHICAGO

- Dist. to your Dealer by C. B. Sales Co.
- 2240 S. Michigan Ave.

### INDIANA

### EVANSVILLE

- Dist. to your Dealer by Tri-State Distributors
- 208 N. W. 8th Street

### INDIANAPOLIS

- Dist. to your Dealer by Mannix Auto Supply
- 602 North Capitol Ave.

- Ralph's Muffler Shops
- 854 Mass Avenue

### KANSAS

### WICHITA

- Dist. to your Dealer by Manufacturer's Brokerage Co.
- 114-116 Pattie

Member, National Automotive Muffler Association



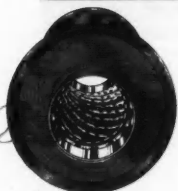


# ...Quiet Power, new as tomorrow!

A beautiful car... an engine full of waiting power... and, underneath, that final touch of perfection—the brilliant new **Belond "500,"** most sensational straight-through muffler ever built. You couldn't ask for a sweeter combination... and you feel it from the feather touch of your throttle that swings you with a quiet burst of power from a standstill to a rush across the countryside in nothing flat. You sail, your engine breathing deeply, taking in the fuel evenly, effortlessly... exhaust gases sweeping through the thrust-action Spiral Core of your **Belond "500"**—and out! There's nothing to hold you back. Hills level off... stiff grades are a breeze... your engine's giving you everything it's got—that **EXTRA POWER** that makes "just a drive" an adventure. And, you're surprised to discover you've come a lot farther on less gas than ever before!

For today's modern driver—for straight-through performance with quiet tone—Belond belongs!

## Belond "500"



\*Patent Pending

premium quality  
**MUFFLER**

as low as **\$8.90**  
slightly higher east of the Rockies

### See your nearest Dealer Soon —

#### KENTUCKY

**CORBIN**  
• Owen's Muffler Service  
302 19th Street

#### MASSACHUSETTS

**ALLSTON**  
• Dist. to your Dealer by  
Harvard Automotive  
Specialties  
169 Brighton Avenue

#### MINNESOTA

**MINNEAPOLIS**  
• Arrow Auto Parts Co.  
1608 Washington Ave., No.

#### MISSOURI

**KANSAS CITY**  
• Hollywood Muffler Shop  
2743 McGee

• Dist. to your Dealer by  
McDowell Tire Co.  
1500 Baltimore Avenue

#### ST. LOUIS

• Dist. to your Dealer by  
State Auto Supply  
3300 Lindell Blvd.

#### MONTANA

**GREAT FALLS**  
• Speed Accessory Shop  
812 1st Avenue, North

#### NEBRASKA

**OMAHA**  
• Jones Automotive, Inc.  
1025 So. 20th Street

#### NEVADA

**LAS VEGAS**  
• Nevada Auto Parts  
1401 So. Main Street

#### RENO

• The Motor Parts Co.  
11-17 West Plaza

#### NEW JERSEY

**CAMDEN**  
• Eastern Speed Parts  
1012 Federal Street

#### PASSAIC

• Dist. to your Dealer by  
J & S Distributors  
257 Monroe Street

#### NEW MEXICO

**ALBUQUERQUE**  
• K-W Auto Supply  
6413 Central, N. E.

#### NEW YORK

**ALBANY**  
• Dist. to your Dealer by  
Auto Parts Service  
228 Central Ave.

#### BUFFALO

• Sport and Custom  
Car Equip. Co.  
316 Ramsdell Ave.

#### ROCHESTER

• Phil's Auto Parts, Inc.  
216 Central Park  
Schuber Auto Parts  
558 Lyell Avenue

#### OHIO

**CLEVELAND**  
• Dist. to your Dealer by  
Lee Motor Products  
4701 Gladstone Ave.

• Midwest Auto Specialties  
13907 Miles Ave.

#### COLUMBUS

• U. S. Auto Parts  
608-618 W. Broad St.

#### DAYTON

• Brockman Enterprises, Inc.  
118 Valley St.

#### YOUNGSTOWN

• Baber Auto Parts  
1300 Market St.

#### OKLAHOMA

**OKLAHOMA CITY**  
• Randel's Accessory Supply  
3 Oklahoma locations  
See Yellow Pages

#### OREGON

**EUGENE**  
• The Muffler Shop  
110 West 6th Street

#### GRANTS PASS

• Bridge Street Service Co.  
2015 S. W. Bridge Street

#### PORTLAND

• Exhaust Spec. & Parts  
700 S. E. Belmont  
Howard Auto Supply  
30 S. E. Grand

#### PENNSYLVANIA

**HARRISBURG**  
• Dist. to your Dealer by  
Cheless Auto Parts Co.  
22-24-26 No. Cameron St.

#### LANGHORNE

• Langhorne Speed Shop  
Superhighway &  
Highland Avenue

#### MARIETTA

• Custom Auto Parts  
422 Front Street

#### MOOSIC

• A & A Automotive  
Rt. 11

#### PITTSBURGH

• Abiola Bros.  
5035 Seward Ave.  
217 Electric Ave.

#### BROOKLYN

• Brougher's Power &  
Speed Shop  
5426 Mifflin Rd.

#### GRANTS PASS

• Dist. to your Dealer by  
Steel City Products Co.  
5915 Baum Blvd.

#### TEXAS

**AMARILLO**  
• Custom Car Supply  
713 East Tenth

#### DALLAS

• Oak Cliff Muffler Shop  
227 E. Colorado

#### FORT WORTH

• Kragen Auto Supply  
5 locations to serve you.

#### HOUSTON

• Motor Reconditioning Co.  
1810 Pierce

• Temple Auto Care Center  
2900 Fannin, and  
4535 Griggs Road

#### LUBBOCK

• Custom Automotive  
2520 Avenue "H"

#### MIDLAND

• Chief Muffler Service  
1004 W. North Front

#### TEXARKANA

• S & S Supply Co.

#### UTAH

#### OGDEN

• Ogden Auto Parts & Glass  
325 22nd Street

#### SALT LAKE CITY

• F. G. Ferre & Son  
1940 State Street

#### PROVO

• F. G. Ferre & Son  
1155 N. 5th, West, Provo

#### WASHINGTON

**BELLINGHAM**  
• B. B. Auto Wrecking, Inc.  
314 E. Champion St.

#### SEATTLE

• Exhaust Spec. & Parts  
502 Rainier

#### SPOKANE

• G & M Auto Supply, Inc.  
329 West Second Ave.

#### VANCOUVER

• Pennco Auto Supply  
3925 Main Street

#### WENATCHEE

• Avenue Auto Parts  
No. Wenatchee at Walnut

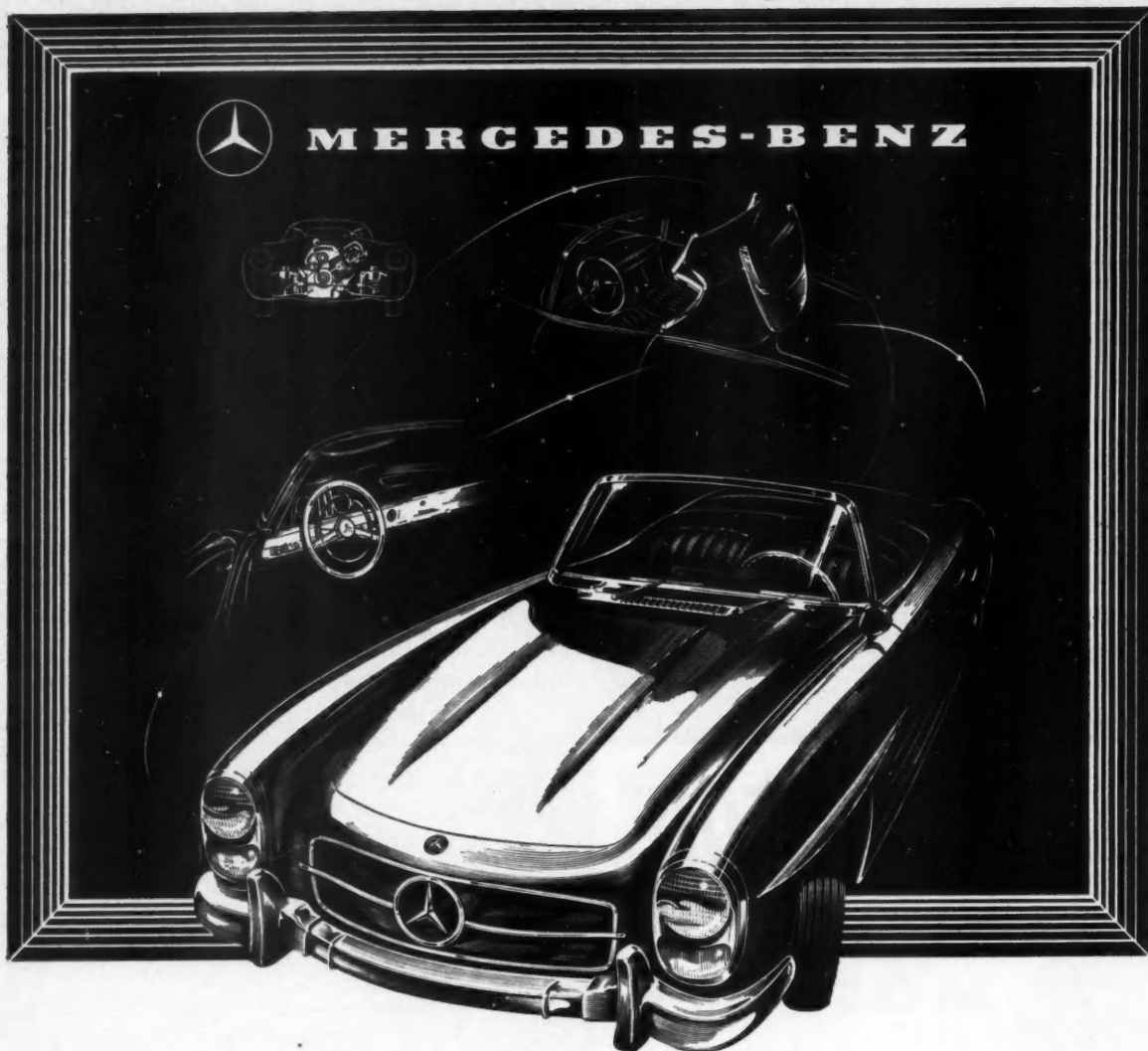
#### WISCONSIN

**MILWAUKEE**  
• Midwest Speed & Power  
2206 West Walnut Street



1957 INDIANAPOLIS "500" WINNER—BELOND EXHAUST SPECIAL, NO. 9





## *The 300 SL Roadster*

**A rare combination: outstanding road performance plus luxury**

The new 300 SL Roadster bears a very close design kinship to the highly successful 300 SLR competition sports car and the 2.5 liter W 196 Mercedes-Benz Grand Prix car. The addition of compensating springs on the 300 SL's single joint rear swing axle results in handling and cornering characteristics of a very high order. Proper use of power and steering will take the 300 SL Roadster through difficult corners at high competition speeds. The space frame is redesigned to accommodate conventional doors, and flexibility of the 250 hp fuel injection engine is such that

smooth acceleration from 15 mph in top gear to maximum speed is easily achieved. Actual overall performance of the 300 SL Roadster is what you would expect: *Outstanding!*

However, what you would not ordinarily expect in a car of such high performance are the luxurious seats and appointments you find in the 300 SL Roadster. Roll-up windows and a snug, truly all-weather top that goes up in seconds, extremely comfortable leather bucket seats and a redesigned instrument nacelle for instant reading are some of the features.

*Mercedes-Benz motor cars are distributed exclusively in the U. S. by the Studebaker-Packard Corporation and are sold and serviced by Studebaker-Packard dealers.*



## **Studebaker-Packard**

CORPORATION

Reuther vs Detroit:

# "SHARE THE PROFITS?"

To clarify how this significant proposal would affect the average car owner, **MOTOR TREND** questioned the head of UAW and top management of the four leading automobile builders on the major issues involved. Here are their answers...

by William Carroll

WALTER P. REUTHER  
UAW President



**WHAT WALTER REUTHER'S** United Automobile, Aircraft and Agricultural Implement Workers Union of America (UAW) wants from Detroit, and how the Union program will affect readers of **MOTOR TREND**, may be a little difficult to decide on the basis of newspaper headlines.

It took a special trip to Detroit (headquarters of the union) and many telephone calls to Mr. Reuther in Miami, Fla., to get you this exclusive information. Originally we were told Mr. Reuther would personally reply to our questions, but as the survey progressed a UAW spokesman entered the scene, had our questions answered and approved them for publication. Though Mr. Reuther did not personally provide this material, we have been told by one right-hand man "This represents Walter's thinking." And on that basis we are sure these are Mr. Reuther's answers, just as though he had given them to us himself.

**Q. How would the profit sharing plan affect MOTOR TREND readers?**

**A.** "Had the UAW's profit-share plan been in effect since, say, 1955," said a UAW spokesman, "with customers of the auto industry receiving their year-end rebate as the UAW now requests, the inescapable facts are these: each car-buyer would have received a rebate of between \$70 and \$80 on the purchase of 1955 models and a rebate

of between \$30 and \$60 on the purchase of 1956 models.

He continued, "The corporations have launched a publicity barrage against the UAW claiming the union has no right to a say in the setting of prices. So as not to be accused of attempting to set or affect prices (either at the sales level or at year's end), the UAW's present proposal to the Big Three only 'suggests' that the corporations rebate to their buyers in a direct effort to, in effect, reduce prices and return more purchasing power into the hands of consumers.

"The rebate figures mentioned just above are, obviously, minimum rebates that would have been made because the figures were based on the actual economics of those years. Had the UAW's proposal been in effect since, say 1955, it's obvious that the nation's purchasing power would have shown up in higher auto sales, higher profits—and higher rebates to car-buyers," concluded the statement approved by the senior UAW spokesman.

**Q. Is the UAW program to direct movement of pension funds stepping into management's shoes?**

**A.** "What must be fully understood," replied the UAW representative, "is that the \$1 billion-plus now in pension trust funds belongs to the workers—not the corporations with whom the UAW has negotiated company-paid pensions.

continued



continued from previous page

"Since 1949, most of the companies in the auto industry—including thousands of feeder plants—have been placing 10 cents into the pension fund for each employee, for every hour worked. The vast majority of UAW members realized that, in no other way but through the type of pension plan negotiated by the UAW, could they hope to enter retirement with the financial crutch necessary over and above what was then (1949) extremely meager social security payments.

"The 10 cents hourly could just as easily have gone into straight wages. The workers chose to pool these dimes. The question now arises: Is the investment of these pension funds, belonging to workers, aimed at benefiting workers in their home communities?

"The corporations hold the right to appoint trustees for the funds. These trustees have been investing these funds in a wide variety of high-return projects—commercial buildings, upper

income housing, etc. It's the UAW position that many a social need in many communities goes crying because of the refusal of banks and lending institutions, including pension fund trustees, to invest in municipal programs (with a fair return on municipal bonds) that would benefit not just the workers but the entire community in which our members live."

#### Q. How would the Reuther program affect new car prices?

A. "At the moment, the auto industry is limping along at 60 per cent of capacity," said the UAW spokesman. "The profits the corporations decide on per auto sold are based on a narrowing production output, instead of on the wider base that comes with full utilization of their productive capacity.

"The corner grocer who decides to rope off half his store and continue operating on less space still has overhead costs to face on the unused portion of his store. To meet his set profit level, he must increase the price of a pound of sugar to help offset

## Reuther's profit-sharing proposal has startled the business

### Ford Motor Co.



ERNEST R. BREECH  
Chairman of the Board

**A**T FORD THE BEST MEN to answer questions about the Reuther proposals proved to be Ernest R. Breech (Chairman of the Board) and T. O. Yntema (Ford Vice-President of Finance). From their recent statements supplied to us by a Ford Motor Co. spokesman we have abstracted the answers for you.

#### Q. How would the profit sharing plan affect MOTOR TREND readers?

A. Mr. Yntema has said, "If Mr. Reuther's wage and profit-sharing proposals were adopted they would increase costs drastically in our industry and also across the country, as the wage pattern in automobiles was followed elsewhere. When Mr. Reuther says his labor proposals are not inflationary, he is talking nonsense.

"Mr. Reuther's profit-sharing proposals

would intensify cost-push (where cost of materials pushes prices upward—Ed.) inflationary forces. There would be inordinate pressure on all companies in an industry to match the wage-plus-profit share in the most profitable company. If the principle of equal pay for equal work is to be pursued, as I am sure it will be, we would see wage inflation the like of which we have never known."

#### Q. Is the UAW program to direct movement of pension funds stepping into management's shoes?

A. The Ford spokesman said, "You may say that Ford Motor Co. officials are known to feel that selection of pension fund trustees falls solely within the province of management. Further, management of the fund, and determination of how money is to be invested is the responsibility of the outside trustee. The union has agreed that the company is responsible for selecting the trustee and determining terms of the trust agreement."

#### Q. In what manner would the Reuther program affect new car prices?

A. "As a propaganda device," Mr. Breech has stated, "the Reuther proposal is a natural, because it appears to offer almost everybody something for nothing. But as a working proposition, it is fanciful and full of fish hooks.

"Take only one part of this remarkable proposal: a suggestion that one quarter of a company's annual profits, after certain other provisions are made, should be returned to the purchaser of its products, thus presumably giving the consumer a wonderful break. One fish hook here is that it would become immediately logical for everyone to buy the product—automobile if you will—of a manufacturer with the highest profit performance. The higher the profit per unit, the bigger would be the customer's bonus. How long do you imagine it would be before we would wind up with a one-company industry? . . . When we are confronted by the con-

sistent effort of one economic group to force the economy to yield greater wage increases than are justified by our gains in productivity, somebody else has to pay the added costs. That somebody is you and you and you—the average consumer."

#### Q. How do unions cooperate in improving quality of workmanship by their members?

A. Ford spokesmen had little to say on this subject, though Mr. Yntema has said, "The productivity of society is reflected in the physical volume of output-per-man-hour worked. This output-per-man-hour is usually called the 'productivity of labor.' The term, however, is a misnomer because laborers are not responsible for much of the increase in productivity. The increases in productivity come mainly from management's utilizing capital and putting into operation the improvements discovered by scientists, engineers and others.

"The UAW is vigilant, as a matter of general union policy, to oppose the attainment of productivity increases through increased effort by its members. The fact of the matter is that unions frequently have impeded productivity advances by featherbedding, slowdowns, and other restrictive practices, and by opposing or penalizing introduction of new processes."

### Chrysler Corp.

**O**N FEBRUARY 3, 1958 a Chrysler Corp. spokesman wrote us: "Here is the statement made by Mr. Colbert on Mr. Reuther's 1958 demands. This is as much as we are saying about them now."

Later that week in Washington, Chrysler's president L. L. Colbert told a Senate Subcommittee nearly the same thing



costs that, on the surface, have nothing to do with the cost of operating the used portion of his store.

"So it is with the auto industry," continued the UAW spokesman. "For months now, a full 40 per cent of the auto industry has remained idle—non-producing. In a full-employment, high-standard-of-living economy, the use of idle plants and idle machinery naturally eases the need for meeting costs on unused plants and machinery. With lower overhead costs, the cost of autos could and should decrease—to the consumer's benefit."

**Q. How do unions cooperate in improving quality of workmanship by their members?**

A. "The corporations have told the UAW in as plain language as possible that prices and design and quality, etc., are decisions that rest with management alone," stated the UAW man. "Also among management's prerogatives is the determination of inspection standards. In the postwar years, as the race to capture

the auto market reached its peak, there has been a continuing relaxation by the corporations in inspection standards.

"Nevertheless, there appears in every UAW contract a clause which commits the UAW to: 'Continuing improvement in the standard of living of employees depends upon technological improvements, better tools, methods, processes and equipment and a co-operative attitude on the part of all parties.'

"Shortly after the war, it became obvious that American industry was suffering from a critical shortage of skilled manpower. For several years the UAW was unsuccessful in its attempt to have the nation's leading corporations adopt skilled trades programs to help overcome the crucial shortage of tradesmen.

"Had it not been for the incessant urging of the UAW," concluded the union spokesman, "and other industrial unions that saw the facts of life as the UAW saw them, the nation today would trail even more than it already does the Soviet Union's development of skilled workers."

## world. Here is Detroit top management's reaction.

when he said, "As the Subcommittee knows, we have felt that these hearings are not a proper forum for the discussion of issues that will arise in the forthcoming collective bargaining between Chrysler Corp. and the union representing its employees."

However, from Mr. Colbert's public remarks we have been able to abstract material giving us a clue to his thinking about the UAW demands and the MOTOR TREND questions.

**Q. How would the profit sharing plan affect MOTOR TREND readers?**

A. "The UAW has engaged in a long and persistent campaign to force management to abdicate important parts of its responsibility to make business decisions," Mr. Colbert has said. "On the one hand, the union has sought to make companies answerable to some government agency for their pricing decisions. On the other, it has sought, in effect, to shift the making of these and other business decisions from company management to union officials.

"In an effort to accomplish these overall objectives, the UAW repeatedly and persistently has sought to force the companies to show confidential competitive

information. We do not believe revealing it would be in the public interest," Mr. Colbert told the Senate Subcommittee. "These matters are fundamental to our ability to compete, and revealing them undoubtedly would weaken this ability and injure competition in our industry.

"Maintaining effective competition is fundamental to preserving the American economic system. And if effective competition is to be maintained, the managers of American firms must continue to have the responsibility for making the decisions that are essential to the successful operation of their business."

In his remarks Mr. Colbert said, "Any yielding to efforts aimed at weakening these responsibilities will contribute directly to strangling our competitive enterprise system, which has made possible for our people the highest standard of living the world has ever known."

**Q. Is the UAW program to direct movement of pension funds stepping into management's shoes?**

A. Mr. Colbert has said, "Mr. Reuther also appears to again insist that part of management's job be turned over to him so that he can increase still further the already dangerous degree of monopoly power he possesses."

**Q. In what manner would the Reuther program affect new car prices?**

A. "What Mr. Reuther proposes would push the prices up still further," said Mr. Colbert in a recent statement. "Another round of cost increases—as past experience shows, would pretty quickly spread through the whole economy. This would mean the workers and others whom he says will benefit can look for more inflation and a higher cost of living."

**Q. How do unions cooperate in improving quality of workmanship by their members?**

A. Mr. Colbert's most recent statement regarding union cooperation was made

during the Senate hearing when he said, "Many more factors than the cost of materials enter into the extremely complex business of manufacturing, pricing and selling automobiles. I might mention the added value that year after year we build into our automobiles, the increasing cost of services such as transportation, the mounting tax burdens, the steadily rising cost of labor, unreasonable limitations on productive efficiency resulting from employees not giving a full day's work for a full day's pay, and the obstacles to efficient operations resulting directly from unauthorized strikes and slowdowns."

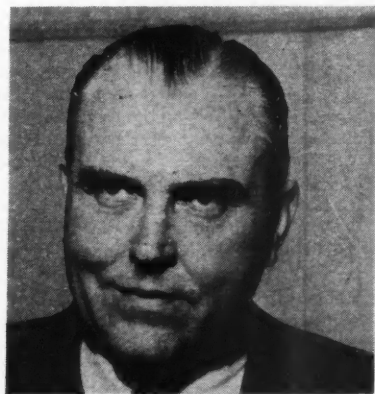
## General Motors



**HARLOW CURTICE**  
President

**DUE TO THE FACT** that Harlow Curtice (president of General Motors) was in Washington testifying before the Senate Anti-Trust and Monopoly Subcommittee while we were in Detroit, we

continued



**L. L. COLBERT**  
President

## SHARE THE PROFITS?

continued

had to rely on some of Mr. Curtice's recent statements to answer the same questions asked all four motorcar makers and Mr. Reuther of the UAW.

### Q. How would the profit sharing plan affect MOTOR TREND readers?

A. Mr. Curtice said to the Senate Subcommittee: "I would like to avoid discussion pertaining to that for the very good reason that according to the convention recently completed by the United Auto Workers, profit sharing was one of the publicized demands which has not yet been officially made to us. In due time we will receive from the UAW their proposals representing the demands which we should undertake to discuss at the bargaining table. Therefore I believe we should not discuss the subject here."

### Q. Is the UAW program to direct movement of pension funds stepping into management's shoes?

A. A recent letter from a GM spokesman told us, "We have refrained from making public statements on the subjects of 'the UAW program to direct movement of pension funds' on the basis that we consider them items which more properly should be discussed at the bargaining table during our upcoming negotiations with the UAW."

### Q. In what manner would the Reuther program affect new car prices?

A. "Increased payroll costs have been the largest single element in our rising costs," Mr. Curtice has said. Comparing cost increases during the 1957 model year with 1958 price increases on a 'composite' car basis, Mr. Curtice stated, "Forty per cent of General Motors' increased costs—about \$51 per unit—are not being recovered through price."

To demonstrate where and how much costs have risen, the GM president compared costs and prices on a unit basis for a composite car—meaning, he explained, the average of all passenger car models in the five GM lines, weighted on the basis of projected sales volume.

"Total unit costs rose \$125 for the 1958 GM composite passenger car in the period between the introduction of the 1957 models in the fall of 1956 and introduction of the 1958 models a year later," he has said. "However, the average increase in the wholesale price of this 1958 composite car is only \$74 over the corresponding price of its 1957 counterpart. Thus, 40 per cent of GM increased costs—about \$51 per unit—are not being recovered through price. Another way of saying this is that for every dollar of increase in known costs, price has risen only 60 cents."

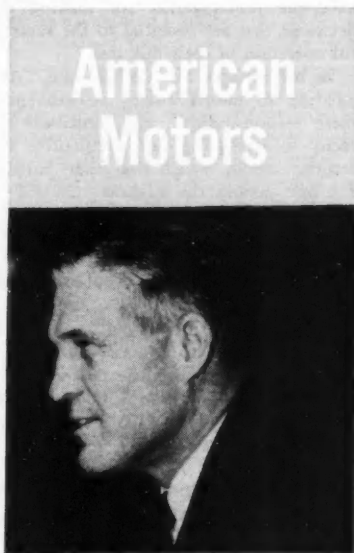
In breaking down the \$125 of increased

costs for a 1958 composite car Mr. Curtice has stated, "In cost of materials plus freight—\$35; this figure included a total steel cost increase of \$27. Steel costs have increased almost \$10 a ton since GM's 1957 models were priced in the fall of 1956. Since 1.84 tons of steel were required to build the 1957 composite car, the increase in costs resulting from the higher price alone amounted to more than \$18 per car. In addition, there was a further increase of \$9 in the steel cost of the 1958 composite car as a result of added refinements and design changes which increased its size and weight."

"Payroll and related employment costs took \$52 or 42 per cent of the total \$125 cost increase. The \$52 includes about \$45 in increased wage and salary rates and fringe benefit costs . . . This explains," Mr. Curtice has said, "why increased productivity resulting from better methods and processes has not had more effect in counteracting the impact of increased material and labor costs."

### Q. How do unions cooperate in improving quality of workmanship by their members?

A. General Motors declined to comment on this question, "on the basis that we consider this an item which more properly should be discussed at the bargaining table during our upcoming negotiations with the UAW."



GEORGE ROMNEY  
President

**S**INCE GEORGE ROMNEY, president of American Motors, was busily engaged with Senate hearings and stockholders' meetings, we were unable to talk to him personally. He suggested, however, that we could undoubtedly extract the answers to our questions from an advance copy of his statements made before the Senate Committee on Anti-Trust and Monopoly. This was the same hearing in which Mr.

Romney made his sensational declaration that the present excess of power in both industry and the union in the automobile business should be divided to free the birth of new competition and open the door to lower prices, higher employment and improved products. It was from the unabridged text of his testimony that we found the following answers to MOTOR TREND's questions.

### Q. How would the profit sharing plan affect MOTOR TREND readers?

A. "The nature of the UAW's 1958 profit sharing proposal is another illustration of the union's method of securing participation in management," said Mr. Romney. "Profit sharing, in principle, is neither new nor evil. If it is wise policy for executives to share in the profits that they have helped to develop for their respective companies, there is no reason in principle why other employees may not share in accordance with the extent of their contribution."

"Inherent in Mr. Reuther's proposal is that the union shall not only have a share in the profits, but shall also share in determining how those profits shall be made and distributed. For example, this would give the UAW the basis on which to insist on the right to negotiate the use of earnings for the maintenance and replacement of worn-out plant facilities, heretofore established solely by owners or their representatives. The UAW has always insisted that it wants no voice in the management. Perhaps without Mr. Reuther's full realization, his proposal to share the profits would inevitably open the door to UAW insistence on sharing in the management and ownership rights."

Further Mr. Romney has said, "The cold brutal facts are that the 1958 auto settlements are likely to send another block-buster chain reaction wage-spiral across industrial America that would aggravate most of our present economic ills and complicate our international problems."

### Q. Is the UAW program to direct movement of pension funds stepping into management's shoes?

A. Mr. Romney to the Senators: "One of the 1958 demands is 'the right of workers to have a voice through their union in the investment of a reasonable percentage of the pension funds . . . To date the investment of these funds has been in the hands of trustees appointed exclusively by the corporations.'"

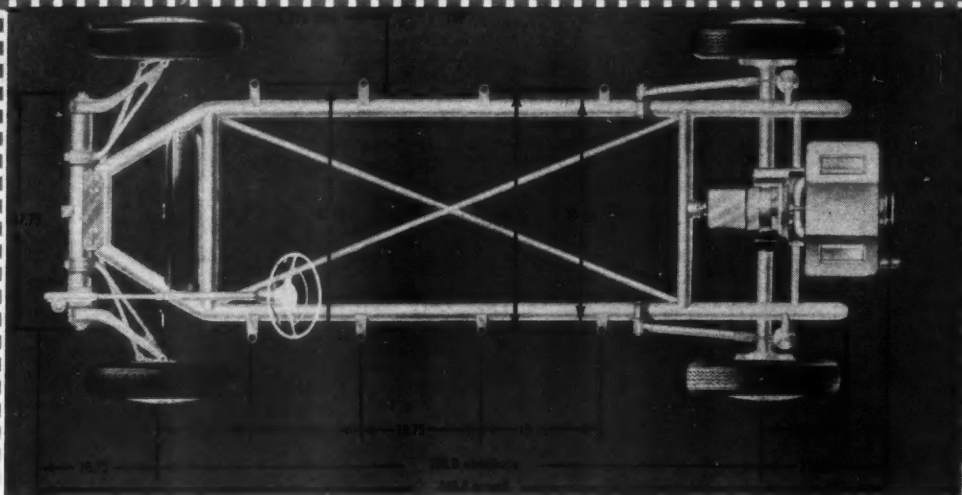
### Q. In what manner would the Reuther program affect new car prices?

A. Mr. Romney has said, "The 1958 automotive collective bargaining results will become a major factor in the higher costs and prices of practically everything that goes into an automobile and of most industrial goods and services that figure

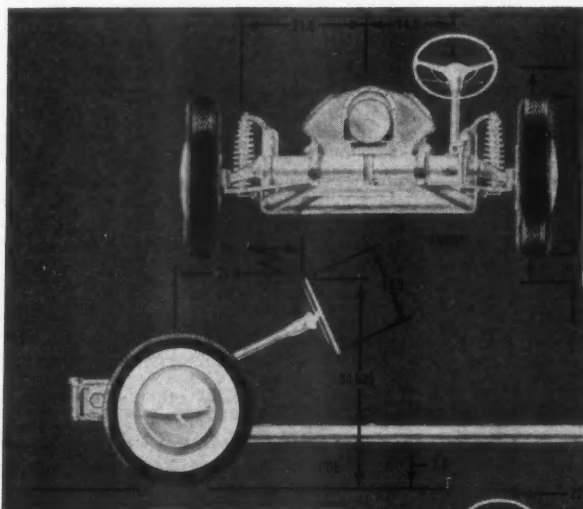
continued on page 53

# CAR DESIGN CONTEST

## SPECIFICATION CHANGE



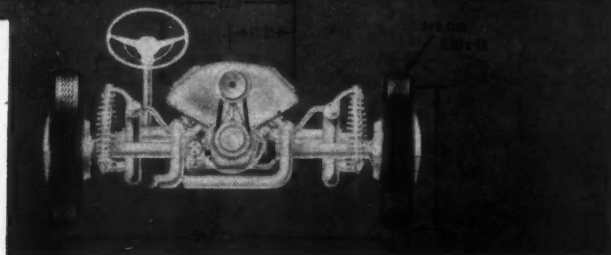
This will make the job easier



**TO ALLOW** greater latitude in body designs you may alter the length, angle, and position of the steering column and wheel shown on pages 40-41, March 1958 MOTOR TREND. Do not use drawings shown here as basis for designs. Official drawings are those in the March issue and design drawings must be made to that same scale.

### REMINDER

Don't fail to enter the CAR DESIGN CONTEST announced in the March '58 MT. Remember, the deadline is June 1. This contest offers you a chance to win company stock, cash and cars as set forth in the official rules in the March issue.





**Editor's Note:** Sam Hanks, '57's Indianapolis winner, race driver par excellence, and recipient of numerous awards (including the Hickok Award, KNKY Athlete of the Year, Los Angeles Times Award for Auto Racing, and Helms Foundation Athlete of the Year), gives his off-the-cuff answers to some pointed questions asked in a tape-recorded interview on the subjects of safety, needed improvements in today's cars, tips for car buyers, and the horsepower vs. economy situation.

## SAM HANKS SAYS:



"The brakes on our present-day cars are very inadequate for the amount of speed the car is capable of . . ."

"The power steering setups they have today are too sensitive; they're very quick and might cause accidents . . ."

**Q.** When you were keeping up a hectic pace on race-tracks all over the country—that is, before you retired from racing—did you feel at ease on the streets and the highways? And do you now feel at ease on the streets and highways?

**A.** Before the war, when I raced all over the country and towed the race car, driving on the highways was no problem at all. We didn't have real severe traffic conditions and it was a pleasure to drive on the highways. Today, I'll tell you truthfully, you have to be a real busy man to keep out of trouble. When I drive down the road sometimes I think to myself, "My golly, how could I ever win Indianapolis and fight all this stuff here and be as scared as I am on the highway at times?"

**Q.** Since there are actually a number of modifications you build into a stock car to assure yourself of safety on the track, do you think that these same things should be done to the cars anyone drives on the street? And are they done to your own personal cars?

**A.** I don't do all the things that we do to the racing stock car's chassis because it would require an awful lot of work. I don't use reinforced wheels, reinforced A-arms or anything of that nature. My personal cars are just like they come from the factory with a couple of exceptions.

The first thing I do to every car I buy—before I even drive it home from the dealer—is to take the shock absorbers off and throw them right in the trash can. I don't think the shock absorbers on present-day passenger cars are, well, any good at all. I put on a special set of shocks like Monroe or Gabriel with 50-50 action. They hold the car down and give it perfect control at high speeds—and even at slow speeds. I've converted lots of my friends over to this change. Every one of them has told me this is the best single improvement he could have done. They love it! It improves riding as well as handling qualities.

Secondly, I make sure that all wheels and tires are in balance at all times, and I use very good tires. Of course, in the racing fraternity, we're Firestone people and we think they're the best. I see to it that my car has Firestone 500 tires on it and I run higher air pressure than the factory recommends to use in your passenger car. They recommend in the neighborhood of 24 to 26. In town I never run less than 30 to 32 pounds of air. When I'm driving cross-country I leave home with 40 pounds of air

in all tires. And of course I make sure the car is in good mechanical condition.

**Q.** Does this imply, then, that you think today's cars are not safe?

**A.** Well, let's say that they're not safe enough.

**Q.** How could they be made safer?

**A.** Through better handling, for one thing. They could change the present shocks to ones with 50-50 action. They'll improve the handling characteristics, the ride qualities, and, I think, the safety factor by quite a bit.

Another improvement that should definitely be incorporated in today's car is better brakes. The brakes on our present-day cars are very inadequate for the amount of speed that the car is capable of. We've had quite a race on horsepower by the automobile manufacturers, but it seems like the brakes have been left behind. They've even gone from a 15-inch wheel to a 14-inch wheel, which requires a smaller diameter brake drum than we've had in previous years. The brake drum is hidden in a real big offset wheel with a large tire and gets absolutely no stream of air on it for cooling at all. On our racing stock cars we have air scoops that force the air to the backing plates of the brakes. By doing this we have increased our braking efficiency by about 40 per cent, I'd say, by just cooling them off.

**Q.** Can you think of other safety improvements today's cars need?

**A.** One other improvement I believe the automobile industry could use is better controlled power steering. Of course, we know that the automobile manufacturers are not making any cars for racing purposes; however, the car should have a good feel to the driver regardless of whether he's driving cross-country or in the city. The power steering setups they have today are too sensitive; they're very quick and might be the cause of a lot of accidents. I'd like to see somebody come out with power steering that would be used for parking only and maybe up to about 25 miles an hour. Then from there, it could operate on regular mechanical-type steering. This would give a person the proper feel of the automobile.

**Q.** With these improvements that you feel are needed now, would you still buy a new car?



# "TODAY'S CARS AREN'T SAFE ENOUGH!"



"I don't think the shock absorbers on present-day passenger cars are—

well, any good at all . . ."

"I don't think the manufacturers are right in putting any more horsepower in their cars than they already have . . ."



PHOTOS BY BOB D'OLIVO

## MOTOR TREND INTERVIEW

**A.** Yes, I buy a new car every year regardless of my thoughts on it. The American automobiles are "pretty fine irons," as we call them, and they do a real good job.

**Q.** What car would you buy?

**A.** Well, at the present time we own two 1957 Mercurys, and I believe if I were going to buy—when I do buy—a new car in '58 it will be in the Ford family. The reason is I've had Ford products for a long time, driven them cross-country, towing the race cars, midgets—New York to Los Angeles and back—and I've had very little trouble with them (if at all) on some of my big, long trips. Another thing, when I buy a car I'm not interested in gasoline mileage—I'm interested in performance and dependability. The economy results of any car are controlled by driving technique.

**Q.** Do you have any tips for the new car buyer?

**A.** Well, this is pretty tough to answer, but my suggestion for anyone buying a new car would be to definitely get in the car and drive it. Automobile salesmanship today—like the old gray mare—"ain't what she used to be." Years ago I can remember I used to take a car and drive it maybe a quarter of a day to half a day—or sometimes a full day—to get the feel of the car to see if it was what I really wanted. In looking for a car I look for one that fits me good—the seating is at the angle I like, and the brake pedals and stuff are convenient.

**Q.** Do you think our cars today are improving? Or do you think "they don't build them like they used to!"

**A.** That's a pretty tough one. I can recall in the days before the war and immediately after, I used to tow a midget race car and trailer without brakes on it from here to New York and back with a Ford station wagon and I never had to reline the brakes. I'd drive the car in the neighborhood of 35,000 to 45,000 miles. Of course, in those days we had 80' and 100 horsepower. Consequently, our acceleration and higher cruising speeds were far behind today's car. Today we're up in the 300 figure, so consequently the speed and acceleration are much more. Naturally, the brake application was a lot less before.

The metal in the old cars was probably a little better; it wasn't any better, really, it was just a little thicker, and the cars were a little easier to work on engine-wise and around because they had more clearance. Today's car has a lot of automatic

equipment but most people want it and the automobile manufacturers definitely have to put it on. Yes, I'd say today's cars are definitely improved, otherwise they wouldn't sell.

**Q.** Do you think the manufacturers are right in putting more and more horsepower into their cars?

**A.** No. I don't think the manufacturers are right in putting any more horsepower in their cars than they already have. It's a cinch that we have plenty of horsepower right now. I do believe that horsepower causes people a lot of trouble, but when used properly it can get you out of bad scrapes. I like to drive a high-performance car myself.

**Q.** You mentioned earlier that you weren't concerned with fuel economy. Don't you think that Detroit should spend more for development of better gas mileage—for the average motorist?

**A.** When we get on fuel economy, we're on a very touchy subject. Driving technique, as far as I'm concerned, has everything to do with economy. The Mobilgas Economy Runs prove that. I can take a car—my own or anybody else's car—and probably get only six to seven miles a gallon by one method of driving, then turn right around and run back over the same route and get as high as 12 or 15—or what the car's actually capable of getting. So I think fuel economy is definitely tied to the driver's technique and also, naturally, to engine condition.

**Q.** Speaking of engine condition, how do you keep your personal cars in top shape?

**A.** To keep a car in good top shape, nothing will replace periodic inspections and good maintenance. You get out of a car just what you put into it. If you abuse it, it won't be a good running automobile. One of the things I have found in driving—it seems the harder I drive, the better my car runs. If you're limited to a lot of city driving and short driving—where your car doesn't have time to warm up—put in hot plugs and lighter weight oil for better lubrication. This will help the condition of your engine both in running and in life by quite a bit. On the other hand, if you drive a lot of hard miles, use a normal plug that the manufacturer recommends, and maybe a little heavier weight oil. And by all means, higher air pressure in tires. On my own car, I drive it hard and that kind of keeps the engine cleaner inside—and it seems to run better.

/MT



# SHOPPING GUIDE TO IMPORTED

Y  
d  
d  
s  
a  
th  
is  
o  
th  
  
is  
a  
c  
tr  
g  
a  
le  
  
T  
c  
e  
  
s  
o

## MOTOR TREND selects the best foreign car buys in the \$1500-\$2000 and \$2000-\$3000 price ranges, and in the imported sportscar field

**S**ALES OF FOREIGN CARS IN THE U.S. are astounding. In 1954, only 32,403 units were sold. In 1955, when total U.S. sales rose 30 per cent, imports climbed 80 per cent to 58,460. In 1956, total car sales declined 17 per cent. But imports rose 68 per cent to 98,187. Last year, U.S. car sales barely held even, while foreign cars more than doubled their numbers. A fascinating array of autos has contributed to these figures. So great is the selection that the novice can be lost. As an aid we offer our best buys in economy, mid-range-price and sports categories as chosen from close observation. An interesting adjunct to the above figures—80 per cent of U.S. imports are economy cars.

What are economy cars? And why have many Americans forsaken luxury transportation for them? We believe that the prime reason is economy—right down the line. Low initial cost—we have chosen under \$2000 as an arbitrary figure—economical operation and upkeep, and nominal depreciation make the cars desirable. There are sacrifices in space, speed, acceleration and riding—but it is the dollars saved which are most important.

There are other economy vehicles not included here. The Renault 2- and 4-CV, Moretti sedan and Ford's Taunus are a few. Because of lack of popularity, limited service facilities and lack of page space, they are omitted. Coverage on new foreign cars, either as they are introduced or reach the U.S., will be in future issues of MOTOR TREND. One other group is missing—minicars and those in-betweeners too big for minicars yet not quite large enough to be small cars. Some of these are Lloyd, Fiat 600, Isetta 300 and Maico. When conditions warrant, these too will be surveyed and the best buys determined.

# CARS

## Volkswagen

## \$1500-\$2000 ECONOMY CARS

**YOU HAVE TO GO** a long way to beat the Volkswagen as the best dollar-for-dollar buy in the economy class. Its simple, functional design and Teutonic thoroughness make it difficult to find many serious faults with the car. Paint, trim and upholstery, for example, are of incredibly high quality. The ride of the Volks is right up at the top of the list, thanks to full torsion bar suspension. Steering is light and quick, although the swinging rear axles produce a marked oversteer which can get an inexperienced driver into difficulties until the technique of cornering is mastered.

Acceleration is in keeping with the rest of the small car field and is adequate to go along with city traffic. Indicated tops of 80 mph are reported regularly. However, after speedometer optimism is discounted, true flat-out running is nearer 70-72 mph. Volkswagen's transmission, synchro on the top three gears, is one of the slickest going. The air-cooled, flat-opposed, four-cylinder engine, nestling aft, never overworks itself. Piston speed at full throttle is ridiculously low.

Individual front seats do not offer much in the way of support. There is full fore and aft adjustment and a three-position reclining cam to vary the rake of the seatback slightly. Visibility, with the enlarged rear window, is now good.

We don't like the fact that there are no instruments except the speedometer and warning lights for oil and generator. And don't overfill the front-mounted gas tank or you'll ride with fumes.



VOLKSWAGEN 2-DOOR SEDAN

The service and parts situation is quite likely the best in America—a comfort for the cross-country bound. But the biggest single plus is the fact that 35 honest miles per gallon is not unusual. Like we said, 'You have to go a long way . . .'

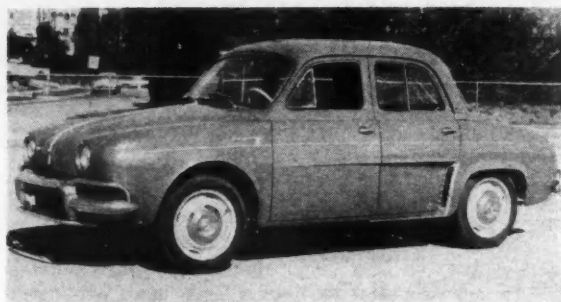
continued



## Renault Dauphine

**THE RENAULT DAUPHINE** may not be the answer to the transportation needs of every American motorist, but it is satisfying the desires of quite a few. Since its introduction in the U.S. in early '56, it has caught on and actually is outselling the mighty Volkswagen in 10 states. The Dauphine has a lot in common with the VW and anyone would be a fool to recommend one over the other. We honestly cannot. The engine is in the rear, water-cooled, four-cylinders, and gives 32 horsepower, which feels like a good deal more. Four-wheel independent suspension makes for good handling with only a little oversteer in hard corners. The Dauphine rides quite well and isn't uncomfortable on a trip. Four doors are a welcome feature. Under the hood are seven cubic feet of luggage space.

Contrary to usual European small car practice, the Dauphine carries a three-speed gearbox. It works well and the extra cog is hardly missed. The car is no speed demon—at 75 mph she's wound tight but not straining. Brakes are more than up to the performance. Renault can really take a bow when fuel consumption is figured. Forty miles to the gallon is not uncommon and practically nobody gets less than 35. The car is honestly finished, inside and out. There is nothing which doesn't add to the total effect of low-cost motoring in a durable vehicle.



RENAULT DAUPHINE 4-DOOR SEDAN

A few wrinkles have been coming out of France to coax a bit more zing out of the Dauphine's engine. But even without them, it is a stimulating car to drive. Safe, light and sure-footed, the Dauphine goes with all the verve and dash of small cars with many more than its 51 cubic inches. The Dauphine is an excellent buy, one of the best economy sedans on the market. We recommend it.

## Ford Consul & Zephyr

**TWO OF THE SEVERAL** English Fords currently being imported to the U.S. can be classed as sisters—or at least kissin' cousins—the Consul Mark II and Zephyr. Both use the same unit construction body shells although the Zephyr's is stretched  $2\frac{1}{2}$  inches to a 107-inch wheelbase. Primary difference lies in the powerplants. The Consul has a four-cylinder, 59-hp ohv engine of 104 cubic inches and the Zephyr's is a six of 156 cubic inches and 86 hp. Bore and stroke are the same on both engines.

The two cars bear strong family resemblances to Detroit Fords of a couple of years ago. Indeed, they are designed on this side of the Atlantic. Manufacturing only is carried out in England. Interestingly enough, both cars are about five inches higher than current Detroit Fords, but they do not appear top heavy. The added height pays off in extra leg- and headroom, ease of entry, and comfortable chair-height seating. There is little to criticize in the way the English have chosen to finish the interiors. Color schemes and fabrics are tastefully chosen. Luggage capacity is 20 cubic feet, double the smaller Anglia and Prefect.

Handling characteristics of both cars are happily similar. Braking is up to the highest standards and fading is difficult to induce. A slight understeer is present, not objectionable, and steering is light and medium-fast. Very little road shock is transmitted through to



FORD CONSUL MARK II 4-DOOR SEDAN

the passengers. Both machines have a column-operated three-speed transmission operating easily in the normal pattern.

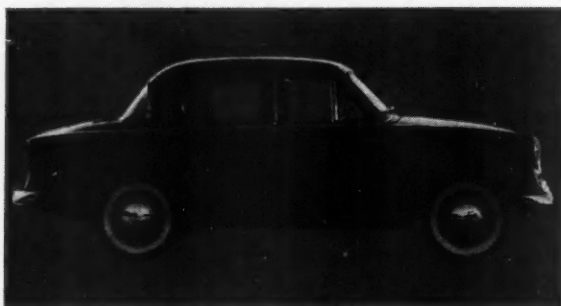
Performance of the two cars is lively. The Zephyr will reach 84 mph and normal driving gives up to 25 miles per gallon. Speed is less for the Consul—about 77. Economy is better—up to 30 mpg. Most U.S. Ford dealers are equipped to service English Fords. Either car is an excellent buy.

## Hillman Minx

**THE HILLMAN MINX** is an excellent choice as a small car for the one-car family. It is durable, service and parts facilities are readily available, and it is an easy car for any member of the family to drive. This year three body styles are being made for the Minx—the sedan, convertible and the Estate Wagon (station wagon). Manumatic transmission, the same as on the Austin A-55, is a desirable extra. More power from a sturdier engine—51 hp—means adequate speed and acceleration to cruise easily at highway speeds and keep up with city traffic.

The Minx has always been noted for its handsome finish and attention to details. Doors close solidly and the unit construction body should remain rattle-free. Upholstery is a good quality leatherette and color schemes are chosen with care. Interior space has been utilized so that even six-footers can find legroom to ride comfortably. Handling, riding and braking are up to good small car standards. There is one minor complaint: the placing of the parking brake between the door and the driver's seat makes it a natural to catch in trouser cuffs.

Hillman's extensive dealer network—the Rootes Group—currently has over 600 dealers in the U.S. who are selling about 1000 cars a month. Most would sell more if they could get them. Parts ware-



HILLMAN MINX 4-DOOR SPECIAL SEDAN

houses at strategic points in the country help Hillman customers happy. Fuel economy ranges between 25-30 miles per gallon—not the best in its class but certainly qualifying it to be named an economy car. The Hillman Minx is a respected name in the light car field and it can be recommended and bought with confidence.



## Metropolitan 1500

**AMERICAN MOTORS'** Metropolitan is an international hybrid—English-built to U.S. specifications. As such it has had the advantages of the thinking of American engineers who know the domestic market better than their overseas counterparts. But while the Metro has sold passably well, it hasn't become the leader that American Motors would like. The tiny coupe deserves more of a play from the public than it is getting. The current model has, perhaps, inherited some of the bad publicity which accompanied earlier underpowered cars. This one is powered by British Motor Corp.'s engine, virtually the same as the MG Magnette's and similar to the MG-A's. With a sturdy 52-horsepower, the car will reach around 75 mph, cruise at 60-plus.

The interior is laid out in a business-like way. A bench seat will take three. Instruments are grouped in front of the driver. The three-speed column gearshift utilizes the familiar "H" pattern. The rear seat is for small children only. Its backrest forms a rather inconvenient entry into the trunk. Steering is fairly light but in faster turns there is a tendency to understeer or plow along in a straight line. The ride is pleasantly comparable to other small machines—nearly all of them become choppy on washboard roads. Braking is smooth and with no appreciable fade. A unit construction body



**METROPOLITAN 1500 HARDTOP**

should remain rattle-free. Radio and heater are included in the Metro's purchase price.

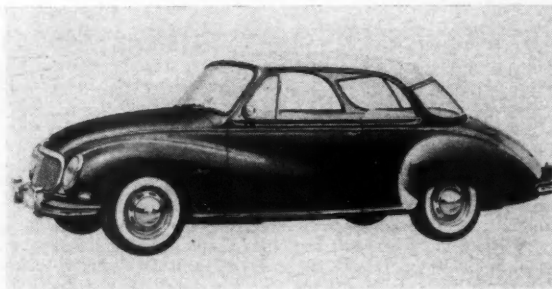
A Metro owner can expect about 25 miles per gallon of gasoline. He has the added advantage of obtaining service from imported car shops as well as Nash-Hudson dealers. The Metro may not be the most glamorous small car made, but it is one of the sturdiest and dependable at a good low price . . . and an experiment by American industry's American Motors that is worthy of support.

## DKW

**FRONT-WHEEL DRIVE** by a three-cylinder, two-cycle engine makes the DKW a mechanically radical, and therefore controversial, car. The body design is unique—though not unattractive. Its proponents say that the car is unbeatable. The DKW's detractors will tell you that the car is overpriced; that mixing oil with the gas is bothersome or that three-cylinder engines sound "funny."

While the DKW is priced at the top of the economy class, there are certain little niceties that are reflected in the price. Paint, trim and body detailing are top quality. As for the inconvenience of two-cycle operation—just remember to mix one pint of SAE 40 non-detergent oil with each five gallons of gas. The peculiar popping idle characteristic is hardly worth mentioning because it smooths out at speed, making the little three-banger sound like a full six. For those who dislike repair bills, the car offers an excellent headstart on engine overhauls—only seven moving parts.

The DKW is unquestionably one of the most solid-feeling small cars on the road. It feels rock-steady at top speeds, perfectly safe in hard turns on winding mountains, and stays glued to the road through dips or ruts. Brakes can be called excellent and there is plenty of legroom to work them. Seating is comfortable and the only way to get better visibility would be to cut the top off the car.



**DKW 2-DOOR HARDTOP**

An extra hundred bucks will eliminate the clutch in favor of Saxomat. Free-wheeling is standard equipment and is perfectly practical as a gas mileage aid.

As for economy, 30 mpg is not too tough to attain. Hard city driving may shade that slightly but the DKW remains in that charmed circle of gas misers. It's a lot of quality for the money. (Road Test of '57 DKW, Sept. '57 MT)

## Fiat 1100

**THE FIAT 1100** is a well-proportioned, scaled-down version of a full-size car which by clever space utilization makes a most practical vehicle. It is characterized by excellent workmanship, finish and careful attention to detail throughout.

Unit body-frame construction is employed and the quiet tightness is evident on the first ride. Four persons can be seated comfortably and vision from the driver's viewpoint is excellent all-around. The car is easy to drive. Controls are convenient, instruments easily seen and read and the column shift presents no stickiness or other unpleasant idiosyncracies.

Under the hood is a neat little ohv 4-cylinder, 66-cubic-inch, 43-horsepower mill that allows sustained 60 mph cruising speeds and reasonably good acceleration. The four-speed transmission is synchronized in the three top gears.

The ride and roadholding are outstanding despite the short 92-inch wheelbase. The car is comfortable on all road surfaces, including washboard. Bumps and dips are taken in stride and there is a lack of dangerous pitching and unpleasant oscillation. Handling qualities are also in the excellent class. Responsive steering and lack of body roll on curves give you a sense of complete command over the car at all times. These qualities are partially due to a well-designed suspension system. In front there are coil springs with



**FIAT 1100 4-DOOR SEDAN**

swinging arms, telescopic hydraulic shocks and a stabilizer bar. The rear utilizes leaf springs, telescopic hydraulic shocks and a stabilizer bar.

If you require parts or service it is well to bear in mind that Fiat is making a very determined bid for its share of the foreign car market and is rapidly expanding dealerships and facilities.

*continued*

## Goliath

**THE POSITION OF GOLIATH** in the small car field might be likened to that of a race horse who is coming up strongly after a slow start. Their initial entry, a two-cylinder model, found small acceptance, but the current 1100 series is catching on rapidly. Its four-cylinder opposed, water-cooled engine, front-mounted, is rugged and lightly stressed. Utterly reliable, it should go many miles without mechanical difficulties.

There is nothing about the Goliath except the smaller size to startle the Detroit-accustomed eye. Attention to such details as finish, interior and body panel fit are reminiscent of cars costing much more. The Goliath is priced slightly above comparable cars in its class. Inside, the seating arrangements are about as comfortable as a small car can be. There is adequate legroom and contoured front seat-backs help hold driver and passenger in place. A non-glare plastic dash carries a full complement of instruments so often lacking in many of the other small cars.

The Goliath has no handling vices. Front-wheel drive pulls the car through the most rugged terrain with ease. A solid beam rear axle displays none of the end-swapping tendencies common in such layouts. The ride is exceptionally good in comparison to similar cars. The column-mounted shift lever of the fully synchronized, four-



**GOLIATH 1100 STANDARD BUSINESS SEDAN**

speed transmission is a knuckle skinner for second to third gear changes. Also, there is an annoying vibration in the lever while accelerating in second gear. Acceleration and top speed are as good as any in its class and gas mileage will range from 30-35 mpg. An excellent car and a good buy even though priced slightly higher than its competition. (Road Test of '57 Goliath, Aug. '57 MT)

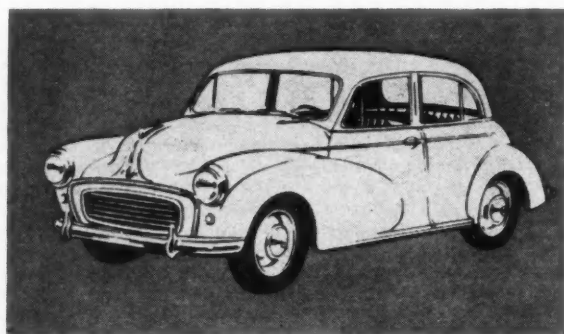
## Morris 1000

**IF THE MORRIS 1000** were to be rated on body design in an economy car beauty contest, it wouldn't take many laurels. For even in a field where strange body shapes are common, it takes getting used to. Function follows form. Its high arched roof is out of proportion. But that is exactly what gives the car more headroom than most of the others in the field.

Headroom is a valuable asset but is hardly enough to sell cars; the Morris has other virtues. The only thing that detracts from a first impression of the car is the somewhat spartan finish of the upholstery and interior trim. The blending of body metal with plastic upholstery around the doors and headliner is not as attractive as it might be. Inside, the backrest of the rear seat swings flat, opening into the trunk and providing tremendous usable space for this size car.

Handling is the greatest. Toss the car over all sorts of roads with great abandon and it goes just where it's pointed. Rough surfaces are smoothed amazingly, thanks in large part to torsion bars in front. Steering is quick with just a trace of understeer—desirable here. The general feel of the car comes closer to approximating the fun of a sports car than any of the small sedans. Brakes do an especially creditable job.

The noise level of the little 37-horse engine might be termed high—or a happy buzz. The engine is potent enough to reach 73



**MORRIS 1000 2-DOOR SEDAN**

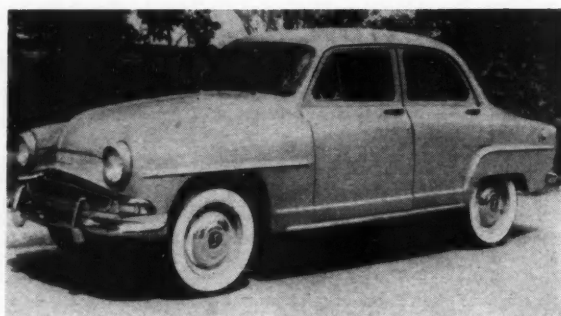
mph and cruise at 70; flexible enough to lug along in fourth gear in traffic or dart nimbly into open space when dropped into a lower cog.

As for gasoline mileage—the hardest drivers will beat 30 mpg. With any care, it is possible to approach a thrifty 40 miles to the gallon. The Morris 1000 has amazing vitality and economy, and is wonderful fun to drive—a best buy by any standards. (Road Test of '57 Morris 1000, Oct. '57 MT)

## Simca Aronde

**IF SATISFIED OWNERS** and repeat customers are any criterion, the Simca Aronde is a successful car. It is really quite remarkable. The exterior is clean and handsome, its styling perfectly acceptable in the American market. Inside, fabrics and trim are top quality. Two sliding-door glove boxes, a pod around the steering wheel to house shift lever and incidental controls, and padding below the dash for knee protection are evidences of typical French ingenuity. A delightful touch is the two-position horn, pleasantly mild for city, demanding on the road.

For an engine of only 78 cubic inches, performance is amazing. The four-cylinder, overhead valve layout develops 48 horsepower and top speed is near 85 mph. Some models use a 57-horsepower engine of the same displacement. They will both idle smoothly without vibration. It is entirely possible to maintain high average speeds because the engine never really strains, even at top speed. The steering is highly sensitive and responds quickly, belying the rather slow turning ratio. An advantage for city traffic is a turning radius of less than 30 feet. Handling and riding qualities are better than average in the small sedan class while brakes require light pressure and are virtually fade-free under most conditions. There is adequate seating for four people and a satisfying amount of luggage space.



**SIMCA MONTLHERY 4-DOOR SEDAN**

Simca is anxious to sell cars in the U.S.—the reason that the car is a few dollars cheaper in America than it is delivered in Paris. There is a great deal to recommend this car, not the least of which is gas mileage which should average around 35 mpg and can easily be stretched to 40 with care. The Simca feels as though it has lots more punch than it actually carries; it is a delightful car to drive.

## Saab 93-B

**SVENSKA AEROPLAN** Aktie Bolaget, manufacturers of supersonic jet aircraft, began to build cars after World War II. Their two-stroke engine with front-wheel drive was obviously inspired by the DKW. Based upon their experience with aircraft, the aerodynamic shape of the Saab reduces air resistance, holding fuel consumption to a thrifty 25 to 35 miles per gallon. The company's approach to the refinement and development of the Saab is quite praiseworthy; they obviously keep their ears open to the gripes and criticisms of the buying public. Sticking to a policy of safety and reliability, the Saab 93-B features the following improvements, suggested by owners: a large one-piece windshield, wipers sweeping 43 per cent more glass area, the finest heavy-duty safety locks on both doors, theft-proof ignition switch featuring heavy armored cable, rear seat adjustable to three positions, optional combined belt and shoulder harness, easy-to-reach hand brake, interior locks on the doors, and a larger, well placed rear view mirror. A courtesy light, door stops, quieter muffler, and new shock absorbers put the finishing touches on the 93-B.

The three-cylinder water-cooled two-stroke engine delivers 38 bhp at 5000 rpm. It has a bore of 2.59 inches, a stroke of 2.87 inches, and a crankshaft mounted on four ball bearings. Without valve gear and with the aid of a torsional vibration damper, the Saab's little three-lunger whirrs away like a sewing machine, with a top speed



SAAB 93-B 2-DOOR SEDAN

around 85 mph. The brakes are excellent, stopping the car quickly and safely, with little strain. The dash panel has been fabricated from thin metal, designed to crumble and absorb impact in a serious crash.

The body-frame is unitized, features independent front suspension, coil springs all around, and a sway bar at the front. A rigid U-shaped crossmember, with hub and wheel at each end, takes the place of a rear axle. This suspension, combined with front-wheel drive, provides sports car cornering. (Road Test of '57 Saab 93, April '57 MT)

## Triumph

**ALTHOUGH NEW TO AMERICA** this year, the Triumph Sedan is no come-lately to the automobile world. It is actually a slightly modified and retrimmed version of the Standard Super 10, known in England since 1952. The Triumph name helps cash in on the success of the great TR-3 sports cars. The little sedan is a true economy car. A four-cylinder, overhead-valve engine of 57.8 cubic inches develops 40 hp, about normal in this class. Top speed is about 75 and comfortable cruising is 65 mph. An option is the clutchless shift controlled by a button on the floor-mounted shift lever.

Steering is light and a quick  $2\frac{1}{4}$  turns lock-to-lock. Turning circle is 32 feet. With individual front suspension and handling, roadholding and ride are equal to the competition. That's pretty good when compared to VW, Morris 1000 and Renault Dauphine. Brakes seem to be well up to their job. Seating offers a slightly different touch—a dropped rear floor for more knee room in the rear seat and lots of front seat headroom—37 inches. The rear seat folds down, expanding the 12 cubic feet of stowage to a whopping 38 cubic feet of lengthy flat load space.

The Triumph promises to make some healthy inroads into the economy market. Over 400 dealers through the U.S. will offer serv-



TRIUMPH 4-DOOR SEDAN

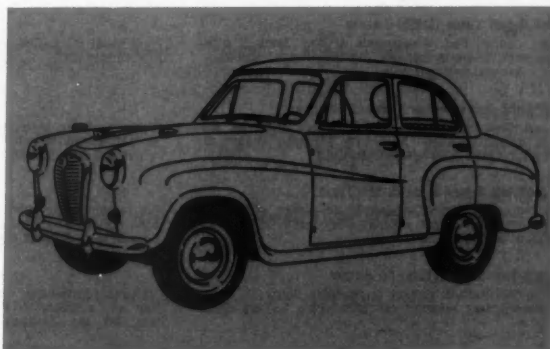
ice and parts. It is a handy and practical four-door sedan, ideal as a second car or even as the sole auto for a two-child family. Mileage figures of 35-40 mpg are mighty pleasing to contemplate when the gasoline bill arrives. At its price, this new British import can easily become a best seller. Everything is in its favor.

## Austin A-35

**THE AUSTIN A-35** is a prime example of low-cost utility transportation for a maximum of four persons. It contains no unnecessary frills but isn't quite as stark as it seems. Performance from the 34-bhp four-cylinder engine is surprisingly good. The engine is quite similar to the unit in the Morris Minor and, not surprisingly, overall speed and gasoline mileage are nearly identical. Top speed is about 73 mph and fuel consumption will be 35-40 mpg. The engine is quite willing to cruise at 60 mph. A factory test held that speed for 25,000 miles without mechanical failure. The floor-mounted four-speed shift lever has a moderate travel and a smooth positive action.

Handling qualities are good. A short wheelbase and narrow track combine for a peculiar oversteer sensation which does not really exist. Steering is fast and light with no unpleasant road feel. Despite the short wheelbase, there is little pitching and the general ride is comfortable. Certain surfaces transmit an unpleasant amount of road noises into the car. Brake pedal pressure is rather high. Interior layout is comfortable but seating is minimum. Vision is good as is ventilation—both important in a small sedan.

The A-35 is probably most useful in the U.S. to the small family or as a second car in the city. Long trips are not its forte as luggage space is limited. But its very size makes the A-35 a pleasure for traffic work. Within its limitations, the car is a masterpiece of clever



AUSTIN A-35 4-DOOR SEDAN

planning. No wasted space, no needless accessories yet all the essentials required in a modern motor car. It may be one of the smallest but it is also one of the least expensive. As an owner said, "It's a lot more car than shows on the surface."

continued



# \$1500-\$2000 ECONOMY CARS

## INSIDE AND OUT

### AUSTIN A-35 Deluxe 2-door Sedan (\$1557) Gr. Britain

Seats 4 with restricted rear seat legroom. Utilitarian but neat interior

### DAW 2-door Sedan (\$1995) Germany

Good distribution of passenger-luggage space. Seats 5 with adequate rear seat legroom. Excellent visibility all around. Overall length 170 in.

### FIAT 600 MULTIPLA (\$1598) Italy

Unique multiple service car. Only 141 in. long overall but seats 6. Rear wagon-type seats fold flush with floor. Also available in sleeper model

### FIAT 1100 4-door Sedan (\$1855) Italy

Unit chassis-body construction. Good utilization and distribution of passenger-luggage space. Good workmanship and finish

### FORD ANGLIA (\$1539) and PREFECT (\$1639) Gr. Britain

Anglia is 2-door, Prefect, 4-door. Both seat 4. Overall lengths 150 and 152 in. respectively. Utilitarian but neat styling and finish

### GOLIATH 1100 2-door Business Sedan (\$1995) Germany

Seats 4 comfortably—more in a pinch. Pleasant, clean lines. Good craftsmanship. Excellent vision all around

### HILLMAN MINX Special 4-door Sedan (\$1699) Gr. Britain

Attractively styled body with good visibility. Seats 5 adults. Good luggage space. Finish, trim excellent. Large, easy-to-read instruments

### METROPOLITAN 1500 2-door Hardtop (\$1628) Gr. Britain

Seats 2 comfortably in front. Rear seat only for occasional use. Overall length 149.5 in. Good construction and workmanship

### MORRIS 1000 2-door Sedan (\$1705) Gr. Britain

Utilitarian but neat interior. Seats 4 or 5 with some restriction in rear seat legroom. Overall length 148 in.

### OPEL REKORD 2-door Sedan (\$1957) Germany

Reflects GM styling influence, with minimum of chrome. Wrap-around windshield and rear window provide maximum visibility. Quality finish

### RENAULT DAUPHINE 4-door Sedan (\$1645) France

Seats 5 with adequate rear seat legroom. Overall length 155 in. Good finish, workmanship and construction

### SAAB 93-B 2-door Sedan (\$1895) Sweden

Unit construction. Aerodynamic styling. Seats 5 with some restriction in rear seat legroom. Rugged construction. Excellent workmanship

### SIMCA ARONDE Deluxe 4-door Sedan (\$1645) France

Clean handsome styling. Inside fabrics and trim are top quality. Seating for 4 with adequate amount of luggage space. Excellent workmanship

### TIPOPET CROWN 4-door Sedan (\$1995) Japan

High-crowned fenders, modern grille, curved windshield and wrap-around rear window. Body length 169 in. on 100-in. wheelbase. Good finish

### TRIUMPH 4-door Sedan (\$1699) Gr. Britain

Modified, refined version of Standard Super 10 4-passengers. True economy car with ample luggage space

### VAUXHALL VICTOR 4-door Sedan (\$1957) Gr. Britain

Unit-frame construction on 98-in. wheelbase. Beautifully scaled English version of Detroit type styling. Chrome trim at a minimum. Roof 58 in. high. Excellent visibility

### VOLKSWAGEN 2-door Sedan (\$1545) Germany

Excellent workmanship and construction. Seats 5 but rear seat legroom restricted. Overall length 160 in.

## WHAT'S UNDERNEATH

Unit construction with fully stressed skin. Coil springs in front, leaf in rear. 4-speed box with floor lever

Front wheel drive. 4-speed manual transmission with automatic magnetic clutch optional. Suspension by transverse leaf springs

Independent 4-wheel suspension. Differential and 4-speed transmission mounted as unit with rear-mounted engine

Independent 4-wheel suspension. Brakes have large frictional area, finned drums. Box is 4-speed with column shift

Unit construction. Coil springs in front, semi-elliptics in rear. 3-speed box with floor lever

Front-wheel drive. 4-speed manual transmission. Central tube frame with unit construction

Unit construction. Independent front-wheel suspension by coils, swing links. Rear suspension semi-elliptic leaf springs. Hydraulic shocks. Brakes practically fade-proof

Unitized construction. Column shift, 3-speed transmission. Coil springs in front, semi-elliptics in rear

Unit construction. Torsion bar front suspension, semi-elliptics in rear. 4-speed manual transmission

Unitized all-steel construction. Independent front suspension by coils, semi-elliptic rear springs. 3-speed synchromesh transmission

Independent 4-wheel suspension with coil springs. Transmission is 3-speed with floor lever

Front-wheel drive. Coil springs all around. 3-speed box with column shift

Highly sensitive steering. Turning circle of less than 30 feet. Column-mounted shift lever. Two-position horn—loud and soft. Padded dash

Box-section frame braced for rigidity. Coil and wishbone springing in front, and semi-elliptic at the rear. Column shift, 3-speed synchronized box

Unitized construction, independent front suspension by coil and wishbone. Hydraulic shocks. Synchromesh in 2nd, 3rd, and 4th gear. Pushbutton clutch optional

Sure-footed with good weight distribution. Independent front suspension with coils. Wide leaf springs at rear. Hydraulic shocks all around. 3-speed synchronized box

Independent 4-wheel, torsion bar suspension gives excellent roadability, medium-firm ride. 4-speed transmission one of the best

## WHAT MAKES IT GO

Ohv, 57-cu.-in. engine develops 34 bhp. Compression ratio 8.3 to 1. Best results with premium fuel

Uses 3-cyl., 2-stroke 45-bhp engine. Has only 7 moving parts. Mix oil with gas

Engine is ohv 4, develops 22 bhp from 38.6 cu. in. Exceptionally easy to reach all service and adjustment points in engine compartment

Engine is front-mounted, ohv 4 developing 43 bhp

Uses side-valve 36-bhp 4-cyl. engine. Variety of optional speed equipment available

Opposed 4-cyl. ohv engine develops 46 bhp. Compression ratio 7.3 to 1. Uses regular grade fuel

Improved 51-hp engine is 4-cyl. ohv. Zenith carburetor, thermo manifold provide good cold weather starting

Uses Austin A-50, 52-bhp, 4-cyl. ohv engine

Ohv, 4-cyl. engine develops 37 bhp. Compression ratio 8.3 to 1. Best results with premium fuel

4-cyl. ohv engine with 90.8-cu.-in. displacement develops 56 bhp at 4400 rpm. Simple, sturdy engine needs minimum maintenance

Water-cooled, 4-cyl., rear-mounted engine delivers 32 bhp. Uses regular grade fuel. Wet cylinder liners expedite overhaul

Water-cooled, 2-stroke, 3-cyl. engine develops 38 bhp. Mix regular grade fuel with non-detergent oil

4-cyl. ohv 78-cubic-inch engine develops 48 bhp

4-cyl., 4-cycle ohv square-type engine, with short-stroke piston. With 8 to 1 compression ratio, engine develops 60 hp at 4400 rpm. 12-volt electric system

4-cyl., ohv, 57.8-cu.-in. engine develops 40 hp. Simple, sturdy design requires minimum maintenance. 12-volt system

Over-square 4-cyl., ohv, 92-cu.-in. engine. With compression ratio (optional) of 6.8 to 1 it produces 52 bhp. With 7.8 to 1 it develops 55 bhp on premium fuel

Rear-mounted, 4-cyl., air-cooled engine delivers 36 bhp. Unit not highly stressed to ensure long life. Uses regular grade fuel

Prices are New York Port of Entry figures including ocean freight, U.S. excise tax and import duty.





## HOW IT PERFORMS

Cruises at 60, top speed over 70 mph. Fuel consumption 35-40 mpg

Fuel consumption 25-30 mpg. Top speed about 75 mph. Good brakes and handling qualities

Fuel consumption about 40 mpg. Top speed about 55 mph. Very good riding and handling characteristics

Exceptionally good riding and handling characteristics. Fuel consumption about 30 mpg

Top speed about 65, cruises at 55 mph. Acceleration fair with standard engine. Fuel consumption 27-34 mpg

Very good roadability, handling and ride. Top speed about 75 mph. Accelerates 0-60 in about 25 secs. Fuel consumption about 30 mpg

Excellent for dodging through traffic. Fuel consumption averages 20-30 mpg. Top speed in 70's. Excellent road-holding

Top speed about 75 mph. Accelerates 0-60 in 19-20 secs. Fuel consumption average about 25 mpg

Exceptional cornering ability. Accelerates 0-60 in about 28 secs. Top speed about 75 mph

Ball bearing steering. Maximum speed about 77 mph. Excellent brakes

Fuel consumption 35-40 mpg. Top speed about 75 mph.

Has excellent rally and race record. Top speed about 85 mph. Good riding and handling characteristics. Fuel consumption 25 to 35 mpg

Fuel consumption averages 35 to 40 mpg. Top speed near 85. Handles full load with ease and idles smoothly. Brakes virtually fade-proof

Maximum speed rated at 70 mph plus. Grade ability is 33.8%. Fuel consumption averages about 30 mpg. Minimum turning radius 18 ft.

40 mpg can be obtained at 65 mph cruising speed. Top speed about 78 mph. 0-50 mph in 18 secs. Steering is quick

Maximum speed in gears—1st 25 mph, 2nd 50 mph, 3rd 72 mph. Fuel consumption 28-31 mpg. Has 34-ft. turning circle, fairly quick steering

Fuel consumption 30-40 mpg. Top speed about 75 mph.

Not included are "emergency freight" charges, U.S. transportation fees, state and local taxes or optional equipment.

## ITS CARE AND UPKEEP

Parts availability and service facilities good in major cities

Parts availability and service facilities limited to major cities. Car requires minimum of repair and maintenance

Parts availability and service facilities best in major cities. Dealer organization growing rapidly

Parts availability and service facilities best in major cities. Dealer organization growing rapidly

Service and parts available at most Ford dealers

Parts availability and service facilities best in major cities

Service and parts availability excellent through over 600 dealers in U.S.

Service and parts available at all American Motors dealers

Parts availability and service facilities best in major cities

Service and parts availability excellent. Sold and serviced through Buick dealers in U.S.

Parts availability and service facilities good because of large dealer organization. Repairs are generally inexpensive

Service facilities excellent but limited to East Coast at present. No dealer west of Chicago. Rugged design makes little service necessary

Service and parts availability best in major cities

Service and parts availability limited due to limited importation

Parts availability and service good. Numerous dealer outlets

Parts and service excellent. Sold through Pontiac dealers in the U.S.

Large sales volume, extensive dealer organization ensure excellent service facilities and parts availability. Repairs generally inexpensive

## OTHER MODELS AVAILABLE

### AUSTIN A-35

Only model in price class

### DAW

Hardtop 2-door (\$2195), 4-door sedan (\$2395), station wagon (\$2530)

### FIAT MULTIPLA

Sunroof convertible (\$1360), 2-door sedan (\$1298)

### FIAT 1100

Familare station wagon (\$2069)

### FORD ANGLIA, PREFECT

Escort station wagon (\$1629), Squire station wagon (\$1739)

### GOLIATH 1100

Custom 2-door sedan (\$2089), Custom convertible (\$2395), station wagon (\$2289). More powerful Tiger coupe and Empress sedan available soon

### HILLMAN MINX

4-door Deluxe sedan (\$1849), Convertible (\$2099), Husky station wagon (\$1535), Minx 4-door station wagon (\$2299)

### METROPOLITAN 1500

Convertible (\$1650)

### MORRIS 1000

4-door sedan (\$1794), Deluxe 4-door (\$1860), 2-door Deluxe (\$1761), convertible (\$1745), station wagon (\$1912), Deluxe station wagon (\$1967)

### OPEL REKORD

Caravan 2-door station wagon (\$2370)

### RENAULT DAUPHINE

Only model available

### SAAB 93-B

Automatic clutch model (\$1995)

### SIMCA ARONDE

Elysee 4-door sedan (\$1745), Montlhery (\$1810), Grand Large 2-door hardtop (\$1980), Grand Large Special (\$2030), Chatelaine wagon (\$1875)

### TOYOPET CROWN

Deluxe Toyopet Crown (\$2085)

### TRIUMPH

4-door station wagon (\$1899)

### VAUXHALL VICTOR

Only model available

### VOLKSWAGEN

Sunroof 2 door (\$1625), convertible (\$2045), combi (\$2020), deluxe combi (\$2120), deluxe camper (\$2737), Karmann-Ghia coupe (\$2445), Karmann-Ghia convertible (\$2725)



HERE IS A CATEGORY OF IMPORTED CARS which seemingly defies all the rules. Its members are neither sports, economy nor luxury cars, although they may contain elements of all three. They do have a common price range. We have selected arbitrary limits of \$2000-\$3000 in order to define the cost of a middle-priced import. All are selling in direct competition to many of Detroit's products. Few of them will match the speed and acceleration of the average American car nor do they have the same amount of space for luggage and passengers. In many cases they are no easier to park. Nor is gasoline mileage necessarily a factor. Some get mileage up in the economy class but others gulp it down as do Detroiters.

Why, then, do they sell? The very fact that they do, indicates that Detroit is not giving every customer what he wants. Why should anyone buy an MG Magnette over a Ford or Chevy? Undoubtedly, snob appeal enters into it. Some people like to be nonconformist in an acceptable sort of way. A more practical factor is that the consumer can forget about enforced obsolescence—that Detroit bugaboo which pushes facelifted new cars onto the public each year.

The middle-priced imports which have reached any degree of popularity have a certain somberness of design, a classic beauty, which can be rather pleasant. The Citroën ID-19 is a notable exception. However any good designer will vouch for the body's functional, if advanced, design. Another fact which will amaze Detroit fans: there is no horsepower race going on among the builders of these cars. Power ratings are modest and nobody seems to worry much about the competition.

There are a number of imports in this price class which we have not covered because of limited space and lack of general acceptance. As more of these makes gain popularity, we will report on the best buys.

## \$2000-\$3000 PRICE RANGE

### Volvo PV-444

**THIS HIGH-BELTED SWEDISH** version of Detroit styling packs sports car performance into a family-type sedan. Hidden under the Volvo's set-back hood is a small 97-cubic-inch in-line four-cylinder overhead powerplant producing an honest 85 horses. This little push-rod mill peaks at 5500 rpm, and can top a true 95 miles per hour! No "Johnny come lately," some Volvos have been flogged by Swedish owners in excess of 100,000 miles without a reboring job. The PV-444 will accelerate 0 to 60 in 16.3 seconds, do the ¼-mile in 20.3. Fuel consumption averages about 24 mpg.

Volvo's little camouflaged bomb uses independent front suspension, coil springs all around, a sway bar in front, and a panhard rod on the rear axle. The coils are firm, producing a solid ride with very little roll. The PV-444 has established a fabled record of racing wins in the sedan class at sports car races on both coasts. This record promises to climb even higher when the newly announced (extra-cost option) factory-made five-speed gearbox is available. The present three-speed unit is widely spaced, and even a four-speed unit would add greatly to flexibility, especially if it is to be raced.

Exterior finish is glass-smooth, and the chromium trim is of good quality. Instruments include a speedometer, fuel gauge, temperature gauge, oil pressure gauge, and ammeter. The rear seat will accommodate two adults, or three children. The plastic-covered front seats



**VOLVO PV-444 2-DOOR SEDAN**

fold down, providing ample roadside sleeping for two.

The Lockheed hydraulic brakes, fortified with finned drums, are more than adequate for normal operation and dissipate heat rapidly. For an all-around family machine, the Volvo is equally at home when dodging through traffic in an early morning dash for the office, taking the family on a picnic, or participating in weekend races.

## Ford Anglia

**IN THE ANGLIA AND PREFECT**, Ford has a combination of good looks, ruggedness and price, which has continued in production without major change, for five years. Among the most popular of Britain's small cars, they have proved to be tough and dependable—not only pleasant to drive, but in style on the highways of almost every country in the world. Differences between the two are slight. The body shells are the same, except that the Prefect is a four-door, the Anglia a two-door. Grilles, headlight panels and trim vary. Optional versions (as with all Fords) are available with fancier trim, heaters and other accessories.

Both machines are powered by a reliable four-cylinder 71.5-cubic-inch side-valve mill which, like the U.S. Ford V8, has enjoyed astounding competition success through backyard development. In stock form the engine puts out 36 hp at 4500 rpm, and is mated with a strong three-speed box, controlled by a centrally located stick shift. Incidentally, bolt-on hop-up kits are readily available for these engines. In stock form, acceleration time from 0 to 60 mph is 36 seconds. Cruising speed is around 55 mph, with fuel consumption varying from 27 to 34 mpg.

Suspension is in keeping with the weight and size of the cars, with the front independent by coil springs and hydraulic shocks,



FORD ANGLIA 4-DOOR SEDAN

and a rigid rear axle separated from the integral steel body by semi-elliptic leaf springs. Unlike their Detroit cousins, steering is snappy, with two turns lock-to-lock permitting light, rapid maneuvering at all speeds. The brakes are excellent, taking a lot of abuse without fade. In keeping with English ads, "The Prefect is at home in any company and setting." "The Anglia a discreet companion . . ."

## Austin A-55

**THE AUSTIN A-55** may lack glamour appeal but it makes up for it in practicality. It is an all-around, fully functional sedan perfectly suited as a family car. It is roomy, comfortable, safe and reasonably economical. The marque has never been noted for inspired body designs but the somewhat plain exterior should not be allowed to cloud the issue. A little examination will reveal a car which is well constructed and durable.

Two transmissions are offered. A column shift is standard and a Manumatic clutchless gearbox is extra. Neither is the ultimate in convenience. Before deciding upon the Manumatic, the buyer would do well to investigate its peculiarities. The front seat will hold three, but not comfortably. It is fine for two and the rear can accommodate three when needed. Headroom is especially good. Steering is very light and sensitive, even when the car is loaded, and is virtually neutral with neither over- nor understeer. Luggage space is large, the rear having been extended from the previous A-50 model. Plenty of glass insures full vision.

The engine is essentially the same as in the MG-A, although with fewer horses—51 to be exact. Noise level is substantially lower than the MG-A. The car pulls well in fourth gear on hills—something that many small sedans can't do. Top speed is around 80 mph and cruising is nearly the same. Fuel consumption will vary considerably depending upon conditions, and will range from 20-25



AUSTIN A-55 4-DOOR SEDAN

mpg. Brakes are completely adequate for a family car. The ride is firm but rough surfaces are taken more smoothly than with many larger American cars. Weathersealing, heating and ventilating are all commendably carried out.

As a durable light car, the A-55 can certainly be recommended as a good buy. Simple lines will not soon be dated.

## Borgward Isabella

**THE BORGWARD ISABELLA** is one of the world's finest small cars. Pleasantly styled, its beauty is more than skin deep. Even a cursory examination reveals that here is a quality auto. Panels fit and the interior is well executed from fine materials and fabrics. It is a spacious car. A wheelbase of 102 inches makes room for five, and there is a large trunk.

The standard engine, a husky four-cylinder ohv unit, develops 72 very smooth horsepower while the TS (Touring Sports) offers 85 horses. Either engine is a lively performer. In standard tune a cruising speed of 80 mph is effortless and a top of around 87 is no real strain. Engine and front suspension are mounted on a sub-frame, separated from the main frame by rubber. This effectively damps out engine vibration and creates the illusion of an engine much larger than 91 cubic inches.

A column-mounted shift lever controls a four-speed *all synchro* gearbox with closely spaced ratios that are a delight to use. Four-wheel independent suspension smooths out rough terrain. The car steers and handles like a sports car, while riding with all the comfort of the nicely behaved family sedan it is. The unitized body-frame is extremely rigid and the process is responsible for the low curb weight of just over 2200 pounds. One of the more efficient jobs of



BORGWARD ISABELLA 2-DOOR SEDAN

soundproofing keeps noise level down even at high speeds.

Few light cars can match the Borgward's speed and economy. Gasoline mileage checks out between 25-30 mpg, even when pushing to the limit of its excellent acceleration. Zero to 60 takes only about 17 seconds. The Borgward Isabella is one of the best buys.

## Dyna Panhard

**THE DYNA PANHARD SEDAN** is a unique engineering accomplishment which requires a bit of probing to be fully appreciated. Its extensive use of light alloys in body and engine allows it to weigh in at just over 1700 pounds ready to go. While body styling may seem unusual, it has been directly developed from wind tunnel tests and is possibly the most aerodynamic of the small sedans. At its top speed of 85 mph, the car is exceptionally stable.

The 52-cubic-inch engine would be right at home in a light plane. Located ahead of the front axle which it drives, it is an opposed four-stroke air-cooled twin with heads an integral part of the light-alloy cylinders. Output is 42 horsepower. An example of some of the unusual engineering practice is the use of torsion bars to close the valves.

Suspension, too, strays from the routine. Two transverse leaf springs, one above the other, support the front, while the rear is semi-independent using three transverse torsion bars and an open-V tubular axle. Although rather complex, it produces a level steady ride. Steering is light and quick at  $2\frac{1}{2}$  turns lock-to-lock.

By small-car standards the Dyna Panhard is a big car with its 101-inch wheelbase. There is plenty of room for four or five, with lots of luggage space. The body shape and weight pay off in usable horsepower, speed and economy—factors which are not normally



**DYNA PANHARD 4-DOOR SEDAN**

compatible. Fuel economy ranges up to 40 miles per gallon. It is not a cheap car and some may object to the peculiar qualities of the two-cylinder engine. It is a car for the man who appreciates creative engineering along with economy, efficiency and fine road manners.

## Citroën ID-19

**THIS YEAR CITROËN** is offering the model ID-19, a boiled-down, cheaper version of the revolutionary DS-19. Except for interior trim, the two cars look identical. The famous self-leveling hydro-pneumatic suspension system has been retained, along with the drum-type rear brakes and inboard-mounted disc brakes on the front wheel drive-shafts. By dropping the power-assist from the transmission, steering and brakes, and using a single-throat carburetor in place of a dual-throat, the manufacturer has been able to reduce the price. Additional savings have been made through minor changes in trim and a plainer finish.

These few changes have not materially affected handling and performance. With over 185 pounds saved by discarding power-assists, the 66-hp ID engine easily matches the 75-hp DS unit in performance. (The DS will accelerate from 0-60 in 16 seconds, and reach a top speed of 90. Under 60 mph the DS can average 28 mpg.) With steering a bit stiffer than normal, a larger steering wheel and lower gears have been added to assist the driver when parking, but on the road the steering is precise and accurate. An excellent stick shift has been mated to the four-speed gearbox, permitting snappier gear changes than the servo-shift and automatic clutch of the DS. The brake button has been replaced with a normal hanging-type foot pedal on the ID.

For a medium-size European car, the Citroën provides an enor-



**CITROËN ID-19 4-DOOR SEDAN**

mous amount of usable space. Three six-foot adults can sit comfortably in the back seat, and except for somewhat restricted legroom, three more could be carried in the front. By placing the fuel tank under the back seat, the designers have provided an amazing 17.5 cubic feet of uncluttered trunk space! The car is easy to get in and out of, is comfortable, has plenty of legroom, a smooth steady ride, excellent visibility, good ventilation, good seating, confident road-holding, and better than adequate performance.

## MG Magnette

**THE MG MAGNETTE** will never make the racing history that its fierce pre-war counterparts did. They were hot little two-seaters. The new Magnette is a family car retaining just enough sports car characteristics to make it interesting for the man of the house, yet sophisticated enough for milady. The engine is basically the same as the MG-A, but less horsepower makes it smoother. Not that it isn't an excellent performer. Top speed is slightly above 80 and plenty of torque gives a feeling of power in all four gears. All-day cruising at 70 mph is a simple matter. Precise rack-and-pinion steering, hydraulic clutch, two leading shoe brakes and pleasantly smooth floor-mounted shift combine to give the Magnette some of its better driving qualities. Suspension is taut but not bruising, while road-holding is virtually in the sports car class.

Styling of the Magnette could never be mistaken for anything from Detroit. It is typically British. The welded one-piece body-frame should never develop rattles. Panels fit and are carefully finished. Inside are handsome leathers and hand-rubbed woods usually seen only in cars costing two or three times as much. There is enough wheelbase—102 inches—to give ample legroom while bucket seats in front add a sports car touch.

The Magnette is an economy car even though its relatively heavy weight will keep mileage in the high 20's as compared to the



**MG MAGNETTE 4-DOOR SEDAN**

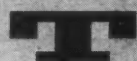
astronomical figures from smaller and lighter machines. It is, more than anything else, smart and comfortable transportation for the family whose members respect quality. Solidly built, the Magnette is to be recommended for the owner who plans to take advantage of the car's long-wearing qualities and enjoy them for several years.



# \$2000-\$3000 PRICE RANGE

INSIDE AND OUT	WHAT'S UNDERNEATH	WHAT MAKES IT GO	HOW IT PERFORMS	ITS CARE AND UPKEEP	OTHER MODELS AVAILABLE
<b>AUSTIN A-55 4-door Sedan (\$216) Gr. Britain</b> Roomy small sedan seats 4-5. Simple lines, smart design. Good vision, large luggage space	Front suspension, independent coils; rear, transverse leaf spring. Wheelbase 99 in.	Engine is similar to MG's but develops only 51 bhp. Has single Zenith down-draft carb., 8.3 to 1 compression ratio. Uses premium fuel	Good handling for sedan. Top speed 81. 0-50 in 17 sec. Fuel consumption 20-25 mpg	Trouble-free engine and running gear. Large dealer and service network	Only model available
<b>BORGWARD ISABELLA Sedan (\$2115) Germany</b> Body and interior show careful German craftsmanship. Very spacious, room for 5. Modern classic design in style for years	4-wheel independent suspension. Unit body frame. 4-speed gearbox is full synchronesh. Wheelbase 102.4 in.	Engines are 72-bhp Standard, 85-bhp TS. Both 4-cyl. ohv, 91 cu. in.	Good handling, cruises easily at 80 mph. Fuel consumption 25-30 mpg. Fine for lengthy trips	Parts supply good. Dealers being added rapidly. Should go a long time between major repairs	Sunroof sedan (\$2695), station wagon (\$2715), TS sedan (\$2665), TS Sunroof sedan (\$3045), TS deluxe sedan (\$3150)
<b>CITROEN ID-19 Sedan (\$2995*) France</b> Distinctively styled, functional body design. Seats 5 in great comfort. Minimum body overhang	Front-wheel drive. 4-speed manual transmission. Unique self-leveling oil-air suspension	Engine is 4-cyl. ohv, develops 66 bhp. 7.5 to 1 compression ratio will take regular fuel	Outstanding ride and roadholding. Top speed 90. Brakes apparently fade-proof	Parts availability and service facilities fair. Dealers being added in U.S.	Only model within price range
<b>DYNA PANHARD DELUXE 4-door Sedan (\$2195) France</b> Light alloy body, aerodynamically correct. Interior layout ideal for driver. Plenty of room for 4-5 plus luggage	Front-wheel drive. Suspension has 2 transverse leaf springs at front, unorthodox semi-independent rear. Welded unit body-frame construction	Engine is 2-cyl., air-cooled, flat opposed. 52 cu. in. develop 50 bhp. Cyl. heads integral with barrels. Tor-sion bars close valves	Good performance. Will exceed 80 mph. Very stable at top speed. Good roadholding, high-speed cornering ability	Popularity is gaining in U.S. and so are service facilities. Parts supply available in major cities	Standard 4-door sedan (\$1995)
<b>FORD CONSUL MARK II 4-door Sedan (\$2012) Gr. Britain</b> Detroit-styled, well-finished body. Will accommodate 5 persons. Good luggage space	Unit body-frame construction. Column shift 3-speed gearbox. Coil springs front, leaf springs rear. Wheelbase 104.5 in.	Engine is 4 cyl. ohv, 59 bhp at 4200 rpm. Oversquare bore-stroke ratio. Compression ratio 7.8 to 1	Top speed about 80 mph. 0-50 in 22.5 secs. Good ride and handling. Fuel consumption about 25 mpg	Parts and service through most Ford dealers	Convertible (\$2351)
<b>FORD ZEPHYR (\$2193) and ZODIAC (\$2383), 4-door Sedans, Gr. Britain</b> Body dimensions similar to Consul. Zodiac is deluxe version. Vision is unusually good	Unit body-frame construction. 3-speed gearbox with overdrive available as option. Wheelbase 107 in.	Engine is 6-cyl. ohv, 90 bhp with 7.8 to 1 compression ratio. 6.8 to 1 compression available for low-grade fuels	Top about 85 mph. 0-60 in 16 secs. Fuel consumption 20-25 mpg. Ride and handling good	Parts and service through most Ford dealers	Zephyr Convertible (\$2532), Zodiac Convertible (\$2910)
<b>MG MAGNETTE Sedan (\$2740) Gr. Britain</b> Conservatively styled 4-door sedan shows careful workmanship. Interiors of fine leathers, handsome woods. Seating for 4 or 5 persons	Smooth 4-speed gearbox. Coil springs front, transverse leaf spring rear. Wheelbase 102 in. Welded one-piece body-frame	Engine 4-cyl. ohv., 91-cu.-in. Similar to MG-A. With 2 SU carbs. develops 60 bhp @ 4500 rpm	Cruises at 70. Top speed slightly above 80. Average fuel consumption around 25 mpg. Virtually sports car handling qualities	Plenty of service and parts through any MG dealer. Inexpensive to maintain	Only model available
<b>SIMCA VERSAILLES 4-door Sedan (\$2199) France</b> Well-proportioned, American-type styling. Roomy interior seats 6 with good luggage space. Good finish and trim	Independent ball joint, coil spring front suspension, leaf in rear. 3-speed manual transmission, column shift	* Side-valve V8 delivers 85 bhp	Top speed about 90 mph. 0-60 in about 18 secs. Fuel consumption 20-30 mpg	Service facilities and parts availability limited to major cities	Trianon 4-door sedan (\$1999)
<b>SUNBEAM BAPIER 2-door Sedan (\$2499) Gr. Britain</b> Styling shows American influence. Seats 4 comfortably. Has good driving position, excellent vision all-around	Sturdy unit construction. Box is 4-speed with floor lever. Optional overdrive controlled by switch on steering column	Ohv 4 develops 73 bhp. Uses premium fuel. Has 2 down-draft carbs.	Can reach 90 mph. Acceleration good. Fuel consumption about 30 mpg	Parts availability and service facilities good in major cities	Convertible (\$2609)
<b>VOLVO PV-444 2-door Sedan (\$2339) Sweden</b> Well constructed, compact design. Overall length 177 in. Seats 5 in comfort. Good distribution of passenger-luggage space	Coil spring suspension all around. Manual transmission is 3-speed with floor lever	Has 91-cu.-in., ohv 4 developing 85 bhp. Best results with premium fuel	Top about 95 mph. 0-60 in less than 17 secs. Fuel consumption 25-35 mpg. Good handling Characteristics	Parts availability and service facilities excellent because of extensive dealer organization	Station Wagon (\$2490)

\*Dealers' suggested total retail price. Prices are New York Port of Entry figures including ocean freight, U.S. excise tax and import duty. Not included are "emergency freight" charges, U.S. transportation fees, state and local taxes or optional equipment.



HE DESIRE TO BUY A SPORTS CAR must come from within and we are not going to attempt to convince anyone that he should buy one. Our sole aim is to pick a few which have been found to be excellent buys and back those selections with reasons. What defines a sports car? One rule of thumb could be: If it can be successfully raced in formal speed contests on road courses against cars in the same displacement class, or even if it could have held its own in such company several years ago, then it's a sports car.

Exceptions come to light at once. For example, these days no one would actually consider winning a race in a Porsche with the standard engine—it takes a Super or a Carrera now. But the standard machine is every inch a sports car. Sports cars needn't be raced. They can be enjoyed for themselves. Gymkhanas and rallies offer inexpensive sport for thousands. No matter if you have to fight freeway traffic—or can hit the open road and put your foot to the floor—sports cars are more sheer fun than any other type.

Nowhere does a more complex selection exist than in the sports car field. The beginning purchaser is wise to stick to the more popular makes until he learns the depth of the water. Certain obscure makes, while they may be masterpieces, have very little resale value except to connoisseurs. And maintenance may be expensive, particularly if the car's initial cost was in the upper brackets.

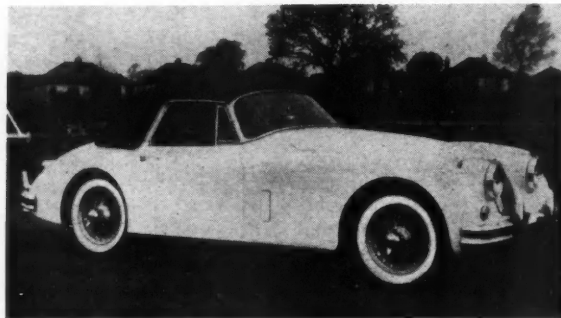
The sports car market is clearly enough defined to enable us to select several best buys. Naturally there are many other sports cars. Page space, lack of popularity and lack of service precludes our recommending them. Future issues of **MOTOR TREND** will cover new sports cars as they are introduced or reach the U.S.

## SPORTS CARS UNDER \$5000

### Jaguar XK-150

**LONG RECOGNIZED** as the queen of the luxury sports cars, the Jaguar XK-150 has a great deal to live up to, following as it does in the wake of the highly successful XK-120 and 140. By now thoroughly refined, the six-cylinder, double-overhead-cam engine develops exactly one horsepower for each of its 210 cubic inches. The coupe (also the convertible) is designed as a 130-mph car and it is entirely within reach. Such a speed is not as risky as it might seem. Stopping is by four-wheel servo-assisted disc brakes which have fantastic resistance to fade. Acceleration is great for a car weighing over 3000 pounds. From 0-60 mph will take nine to 10 seconds and an honest 100 mph can be had in third gear. Times may vary depending upon whether automatic transmission, manual four-speed or manual with overdrive is chosen.

The coupe is now bulkier appearing, four inches wider at shoulder height. More glass area front and rear makes for good visibility. Designed for extended touring, seating is low and exceedingly comfortable with good support in the important areas. Two auxiliary rear seats cannot be recommended for more than casual city riding. Luggage space is adequate for touring. The natural wood dash and sills of previous years have gone, replaced by leather on the coupe and anodized aluminum on the convertible. Finish and trim on the rest of the car is just as fine as might be expected.



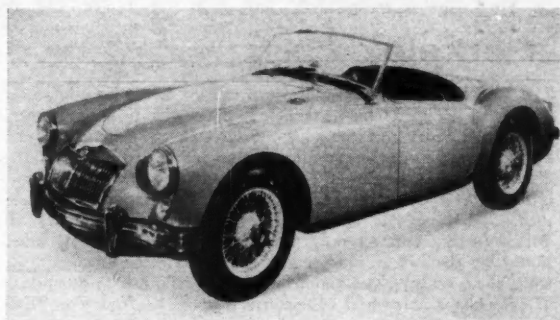
JAGUAR XK-150 CONVERTIBLE

Even though the XK-150 is not designed for competition, its handling qualities have that reassuring solid Jaguar feel. The 150 is a heavy car and does not handle as lightly as say, a Porsche or Austin-Healey. But it is a joy to drive and not objectionable for city traffic. Fuel consumption is light—16-20 mpg—for so hot a machine. The XK-150 is real luxury priced at the bottom of the luxury class.

## MG-A

**MG'S PIONEER WORK** in sports car importing earned for the firm an enviable position in the U.S. market. MG has become so closely identified with sports cars that the name alone has sold many first-time purchasers. Quality product has maintained those sales. The MG-A meets all the requirements for a smart appearing, sturdy, high-performance small sports roadster. As evidence of its durability, it has become the darling of the production racing set—where weak points show up fast. Virtually the only weaknesses that have been revealed are a standard clutch which won't take race conditions, and disc wheels not quite up to competition cornering. Seating for two is ideal but pedal layout is cramped and footroom is narrow. The "A" handles like a dream and is a wonderful combination of riding comfort and roadability. It steers easily and drifts, slides, corners and stops with the agility generally associated with a much higher price tag. It is a pleasant car on a trip but the small trunk limits the luggage space drastically.

High manufacturing standards are much in evidence throughout. Body panels fit nicely, and upholstery and trim are first rate. Mechanical components have been well thought out. The engine kicks out a healthy 70 horses without undue strain and the roadster can get very close to the century mark in speed. A simple folding top with snug curtains contributes excellent weather protection.



MG-A ROADSTER

Consistently low depreciation has made MG's thrifty investments and the "A" follows the pattern. Gas mileage figures of 25-30 mpg make it an economical car to operate and sports car performance at MG's low price classify it as a best buy. (Road Test of '57 MG-A Coupe, Sept. '57 MT)

## Triumph TR-3

**THE PHENOMENAL ACCEPTANCE** of Triumph's TR-2—and currently the TR-3—proves that the buying public knows a good thing. Magnificent handling, good performance, durability, economy and a low initial price make the Tiny Rapid Triumph an all-around desirable package. About the worst thing that can be held against the TR is an uninspired body shape. Next to the smooth lines of the Austin-Healey, for example, the Triumph looks boxy. But there is a certain charm to its design which shines through after a brief association with the car.

As a competition car, the TR has been shaded in its class only by cars costing nearly twice as much. It is one of the few sports cars a true novice can jump into and drive with no fear of any tricky characteristics. The car feels and reacts exactly as it should—solid, sure-footed and safe. Bucket seats are firm and comfortable; the car has tremendous legroom and more luggage space than most sports cars. Weather protection, from a snap-on top which looks good erected, is excellent; the side curtains are simple and effective.

Acceleration and top speed are all anyone could ask—107 mph tops and 0-60 in 9.2 seconds. There is plenty of punch and the brakes to stop it. Disc brakes in front and drums in the rear are a unique bonus in this price class. An attractive feature is the rugged, untemperamental engine. It is a proven four-cylinder design which



TRIUMPH TR-3 HARDTOP ROADSTER

will rev smoothly to 5000 rpm or lug down in fourth gear without protest. Overdrive is optional.

With the extra kiddy seat in the rear, two youngsters will fit nicely. And with gasoline mileage of 25-35 mpg, a family with youngsters can justify a TR. It's a great car and a wonderful value. What more can be asked of a sports car? (Road Test of '57 TR-3, Sept. '57 MT)

## Austin-Healey

**WHEN THE FIRST PICTURES** of the Austin-Healey 100 were made public a few years ago, a ready-made market was created. Here was a machine at a reasonable price which *looked* the way a sports car should. Whether it would perform was of little consequence. Fortunately it was fast, handled well and became a success. Now the first drastic change, the 100-Six, has met with public favor. It is not a successful race car, as was the old 100. The six-cylinder engine needs more than its 102 horses for outright racing. A new Le Mans kit is available to remedy the situation. But in standard trim, the A-H is a comfortable, serviceable sports roadster. The rear seat will handle a couple of small fry and there is ample trunk space.

The engine has enough low speed power and is so smooth that very little shifting is required. Yet with optional overdrive the car will cruise at 80 plus while the engine loafs. There should be little cause for worry about engine repairs; the design is time-proven.

Normally, the car is delivered with what are generally considered extras—wire wheels, heater, tonneau cover. But recently a stripped price has been established so that the enthusiast on a budget can pare his cost and still drive a Healey. Construction and workmanship are generally first class. Seating is very comfortable and the A-H is noted for one of the most draft-free top-down rides on the road.



AUSTIN-HEALEY 100S ROADSTER

The Austin-Healey falls into its own little market niche. It has style and a certain amount of luxury at a price somewhere between the MG and Porsche. Performance should satisfy anyone. To surpass the car on any terms will require the expenditure of considerably more dollars. And that is why it is a good buy. (Road Test of '57 Austin-Healey, April '57 MT)



## IMPORTED CARS

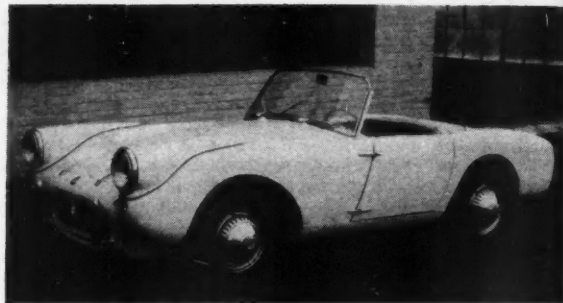
### Berkeley

**THE LITTLE BERKELEY**, a newcomer to U.S. shores, is an important adjunct to the sports car market. It is the lowest priced true sports car for sale today and, for good measure, an economy car. Sounds like the answer to everyone's prayer. But it has disadvantages. It is diminutive and underpowered—but so much fun to drive. The two-cylinder two-cycle engine makes only 18 horses out of 20 cubic inches. (A three-cycle 30-hp model will be available shortly.) The Berkeley will almost get to 60 mph. Acceleration is best left unmentioned but there is an illusion of speed. Gasoline mileage may vary from 35 to 60 mpg and maintenance should be just as economical. The car boasts four-wheel independent suspension, front-wheel drive and swing axles in the rear. Brakes cannot be made to fade.

The Fiberglas body is rattle-free and slick appearing. Seat is a pad over rubber strips but not as bad as it sounds for two people. A jump seat is OK for kids but no adult will fit. There is a simple top, and side curtains—satisfactory but confining. Driving is a sensation difficult to describe. A three-speed gearbox is motorcycle type and easy to master. It seems impossible to do anything wrong in the car. No lean and no bottoming, but look out for chuck holes. It turns and stops exactly where you want it to at nearly any speed.

There is literally no competition for the Berkeley and for that

continued



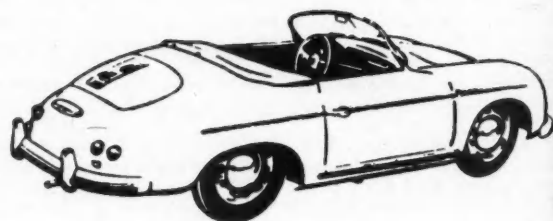
BERKELEY ROADSTER

reason it is difficult to compare with other sports cars. The little machine is perfectly practical everyday transportation for anyone who doesn't mind lots of stares. It is small but once inside there is plenty of room. We feel that we must recommend it as a good buy because it fills a gap in the sports car field. And the Berkeley is low-cost, economy transportation which should last a long while.

### Porsche 1600 & 1600-S

**ALTHOUGH SEVERAL VARIATIONS** are available, all Porsches are of basically identical design. Fabulous detail work, amazing performance and roadholding, and superb comfort characterize each of the four body styles and two engines. A third engine, the Carrera, is available at considerable extra cost; anyone contemplating its purchase should have a firm working knowledge of Porsches. The air-cooled, four-cylinder, flat opposed engines are first cousins to the VW. The two engines, the 1600 (the Standard) and 1600-S (the Super), differ in horsepower, 60 and 75 respectively, in cost and various other mechanical details. The Super is not as docile for city work, especially for the beginner. Unless formal road racing is contemplated, at which point the Super Speedster becomes a necessity, the Standard engine is perfectly satisfactory. Briefly, the Speedster is an open roadster with a utility top while the convertible and coupe are luxury roll-up window models. A removable hardtop model on the convertible chassis has been added this year. All have a rear seat suitable for an adult or two kiddies.

Porsches were public successes almost from the day production began. Sports-wise motorists immediately recognized one of the world's finest small sports cars, comparable to customs costing much more. The cars are so desirable and production so small that world demand has kept resale high. It has been said that the coupe is the



PORSCHE SPEEDSTER

ultimate expression of the body designer's art. True or not, the craftsmanship inherent in every Porsche marks it as a car built to endure.

Whether you want a car for high speed touring, city traffic or road racing, the Porsche is it. If you can afford the initial outlay, it is one fine investment. (For driving impressions, see June '57 MT)

### Arnolt-Bristol

**THE AMAZING ARNOLT-BRISTOL** is best described as an all-business sports car which can be docile as a kitten or growl like a tiger when required. Its shape is aerodynamically derived, giving the illusion that the car is top-heavy. It is anything but. In fact, the shape makes for an exceptionally draft-free, open-air ride. The competition version is delivered sans top and with a low, utility windshield while the touring model has a full top, side curtains and an interior which is plush for such a healthy machine.

A husky two-liter, six-cylinder Bristol engine delivers around 130 bhp, depending upon the stage of tune, and will push the car in the vicinity of 110-115 mph. This is a race-bred auto and it must be remembered that the engine doesn't begin to "bite" until around 3000 rpm—about 62 mph in fourth. Gearbox, braking, cornering and roadholding can be described as superb. Steering is somewhat heavy at low speeds, but once rolling it lightens up. Deep contoured bucket seats hold driver and passenger firmly and comfortably in place and the ride is pleasant enough for trips.

In relation to other sports cars of comparable acceleration and top speed, the Arnolt-Bristol is not cheap. Probably only a confirmed and experienced enthusiast can appreciate its finer points. To its credit, it is not a car which requires a great deal of skill to operate as are some of the extra-high-performance machines.



ARNOLT-BRISTOL ROADSTER

Mr. S. H. Arnolt, who has the engines and chassis shipped from England to Italy for bodywork, and then to America for sale, has produced the kind of car he wanted but couldn't buy. It is a sturdy, dependable sports car for the enthusiast who wants lots of go—and a bargain besides.

# SPORTS CARS UNDER \$5000

## INSIDE AND OUT

### A.C. ACE Roadster (\$4495) Gr. Britain

Lightweight aluminum body. Comfortable driving position with adjustable column. Weight under 1700 lbs.

### ALFA ROMEO GIULIETTA SPYDER (\$3295) and SPRINT COUPE (\$3784) Italy

Beautifully finished, more room for 2 than appears. Roadster has roll-up windows. Both models have adequate luggage space

### ARNOLD-BRISTOL Competition Roadster (\$3995) Gr. Britain, U.S., Italy

Wind tunnel-developed body. Stark but comfortable interior. Seats 2 plus moderate luggage space

### AUSTIN-HEALEY Roadster (\$3087) Gr. Britain

Attractive, well-built body. Two comfortable seats. 2 child seats in rear. Good luggage space and weather protection

### BERKELEY Roadster (\$1695) Gr. Britain

True but small-dimensioned sports car. Unit construction of Fibreglas, aluminum. Overall length 123 in. Seats non-adjustable

### FIAT TV Roadster (\$2525) Italy

Beautiful coachwork, luxury-finished interior. Seats 2 in swivel bucket seats

### JAGUAR XK-150 Convertible (\$4585) Gr. Britain

Spacious and luxurious in contrast to most sports cars. Overall length 176 in. Seats 2 with jump seat for children

### MC-A Roadster (\$2492) Gr. Britain

Good seating position and legroom. Luggage capacity limited. Finish, trim good. Pleasant aerodynamic styling

### MORGAN PLUS-4 Roadster, 2-seater (\$2950) Gr. Britain

Classic era sports car styling. Non-adjustable seats may be uncomfortable for some drivers

### MORGAN 4/4, series II (\$2185) Gr. Britain

Similar to Morgan Plus-4

### PORSCHE 1600 (\$3215) and 1600-S (\$3615) Speedsters, Germany

Handsomely finished, aerodynamic body. Seats 2 in deep bucket seats. Utility seat behind. Complete instrument grouping for driver convenience

### TRIUMPH TR-3 Roadster (\$2875) Gr. Britain

Bucket seats are firm, comfortable. Jump seats for 2 children optional. Good legroom and luggage space. Has plexiglass sliding windows

Prices are New York Port of Entry figures including ocean freight, U.S. excise tax and import duty. Not included are "emergency freight" charges, U.S. transportation fees, state and local taxes or optional equipment.

## WHAT'S UNDERNEATH

Tubular frame. Independent 4-wheel suspension, transverse leaf springs. Box is 4-speed. Wheelbase 90 in.

Unit construction, coil springs all around. Large finned brakes. Wheelbase 94 in.

Firm competition suspension. Close ratio 4-speed box. Brakes practically fade-proof

Rugged frame. 4-speed box, overdrive optional. Wheelbase 92 in. Coil springs front; leaf springs rear

Independent suspension by coils on 4 wheels. Motorcycle type 3-speed box. Front-wheel drive

Oversized brakes with cooling fins. Floor-mounted, 4-speed gearbox. Coil spring independent front suspension

Disc brakes all around. Torsion bar suspension in front; leaf springs in rear. Box is manual 4-speed with overdrive or automatic optional

4-speed box, synchronized in top 3 gears. Wheelbase 94 in.

Very firm suspension by coils in front, leaf springs in rear. Excellent weight distribution. Box is manual 4-speed

Similar to Morgan Plus-4

Unitized chassis-body. Four-wheel independent suspension, swinging rear axles. Best 4-speed gearbox on the road

Disc brakes in front. Box 4-speed with optional overdrive on 3 top gears. Wheelbase 88 in. Competition shocks and springs optional

## HOW IT PERFORMS

Can top 100 mph, 40 standing ¼-mile under 17 secs. Excellent handling characteristics

Top speed in 90s. Fuel consumption 22-30 mpg. Magnificent roadholding and ride

Top is 110 mph. 0-60 in 8.5 secs. Superb handling and cornering. Fuel consumption 17-25 mpg

Cruises easily at 80 plus. Will exceed 100. Excellent handling plus good ride

Handling qualities outstanding. Top about 60 mph. Fuel consumption 35-50 mpg. Responsive and agile

Top speed of 85 mph with great braking, cornering and roadholding ability

Top speed about 130 mph. Can do 0-60 mph in 9-10 secs. Fuel consumption 16-20 mpg. Handling qualifies good

Fuel consumption 20-30 mpg. Does 0-60 mph in about 12 secs. Top about 102 mph. Handling excellent

Excellent handling characteristics. Top about 100 mph. 0-60 in about 9 secs.

Does 0-60 in 29 secs. with standard engine, better with speed equipment

Tremendous roadholding. Will exceed 100 mph with great safety. Powerful brakes

Fuel consumption 23-33 mpg. Does 0-60 mph under 10 secs. Handling excellent

## ITS CARE AND UPKEEP

Service and parts availability limited because of small production

Parts and service good and improving. Tune-ups require skilled hands

Engine sturdy but requires care to maintain best performance. Good parts available from Arnott distributor in Warsaw, Ind.

Huge dealer network makes service and parts no problem. Mechanically reliable

Service and parts availability limited because car only recently introduced. Will improve

Parts and service facilities excellent in the U.S. Fiat noted for reliability

Service facilities and parts availability good

Parts availability, service facilities excellent because of extensive dealer organization

Service and parts facilities limited except for engine

Same as Morgan Plus-4

Parts and service excellent. Very reliable. Upkeep cost low

Parts availability, service facilities good. Numerous dealer outlets

## OTHER MODELS AVAILABLE

Only model within price range

Only models within price range

Bolide roadster with top and curtains (\$4295). Deluxe roadster (\$4995)

Only model available

Hardtop coupe model will soon be available

Only model available

Also available in hardtop coupe model (\$4475)

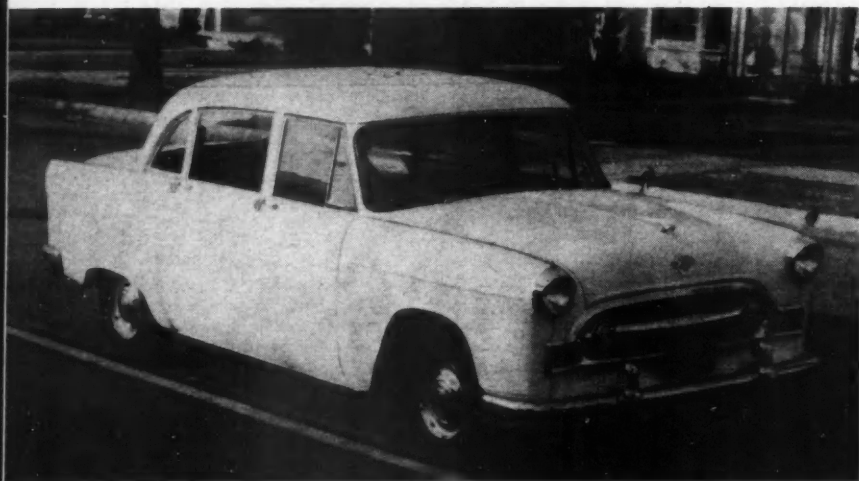
Also available in hardtop coupe model (\$2695)

Available as 4-seater roadster (\$2945). 2-seater convertible (\$2995)

Only model available

Standard and Super coupes (\$3665 & \$4504), convertibles (\$4065 & \$4745). Hardtops will soon be available

Also available in hardtop model for \$2835



CHECKER CAB, without taxi trim, has functional look, no excessive chrome.

# CHECKING THE CHECKER

by William Carroll

**S**O FAR WE'VE BEEN SOLD sedans for turnpiking, wagons for families without horses, and coupes with a back seat made for tiny elves. Now we have a car for people!

Made by the Checker Cab Manufacturing Corp. of Kalamazoo, Mich., it's a plain-Jane four-door sedan designed to transport people from Point A to Point B with a minimum of fuss and a maximum of comfort. Wide-opening square doors, chair-height seats and a 120-inch wheelbase do the job, and do it well.

There is no cornucopia of paint or trim options—just one sedan with one engine and optional compression ratios, automatic or manual transmission, and power brakes, seats or steering. Unusual arrangement is Checker's pricing system which does not include tires as standard equipment. You pick the rubber you want, as it's listed and paid for separately.

Technically speaking there's a rugged collection of well-designed components underneath the nearly chromeless exterior. The long-life chassis parts are hung around one of the industry's sturdiest frames. It's an X-member unit with box-section rails both fore and aft. Two tubular crossmembers join the front rails, another joins the rear at the kickup over the rear axle, and there are channel crossmembers at each end to box the assembly. The X-member also centers the propeller

shaft in a ball bearing support held by a rubber mounting.

A dependable Continental flat head Six is used in all Checkers. The  $3\frac{3}{8}$ -inch bore and  $4\frac{3}{8}$ -inch stroke total 226 cubic inches and give the little Six 95 horsepower at 3400 rpm with a low compression ratio of 7.3 to 1. An Auto-Lite distributor sits on top (out of the way of splashing water) while starter coil and generator are hung high on the left side. Opposite is a single-throat Zenith  $1\frac{1}{4}$ -inch downdraft carburetor with built-in automatic choke and dry air cleaner. A Carter mechanical pump pulls gasoline from the rear-mounted 22-gallon tank. Clue to long life built into the engine lies in the use of five piston rings. There's a chrome-plated top ring, two taper-face compression rings, an expander-controlled oil ring and a wiper ring below the piston pin—truly a formidable oil control system.

The cam is an ultra-conservative grind with a configuration making it almost impossible to "over-rev" the engine. Torque output is reported to be a modest 182 pounds-feet at 1400 rpm.

The rest of the cab is rather conventional. Front suspension is a Thompson Products ball joint setup, reported to be interchangeable with current Fords. Wagner self-adjusting brakes, with a metal spot like Studebaker used, are fitted with lining so hard that it is not unusual to

get 50,000 miles of traffic-fighting cab use from a set of shoes. But don't rush off to Johns-Manville and try to buy some for your own lining-hungry car. Only Checker has the material, and their shoes fit only Checkers and some models of Studebaker.

Chrome steel coil springs in the front team with semi-elliptic five-leaf rear springs that are two inches wide and 55 inches long. Boxed under the floor of the trunk is a 15-plate, 115-amp-hour heavy-duty six-volt battery. Gabriel telescopic shocks, Gemmer worm and gear steering and balanced Budd drop center wheels round out the list of chassis components. An unusual chassis feature is the use of identical bumpers front and rear to reduce repair costs for the cab operators.

One of the car's real virtues is the unique Checker-built body. The interior

We test-drive the car that may be the one to watch—as it challenges Detroit with its functional simplicity, easy servicing, and inexpensive repair

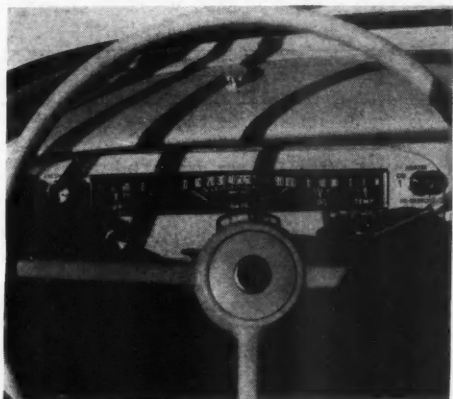
(except seats) is of curved steel structural members which not only surround the passengers but in many cases act as interior trim. Seat, door and panel trim are hard-finish, long-wearing plastic which can be washed or scrubbed as necessary. There's no fuss about fancy rugs in a Checker. The front compartment is floored with a thick rubber mat under which is sound-absorbent padding; rear floors are covered with lifetime linoleum spotted with anti-slip inserts in front of each door.

The grille is a two-piece metal stamping and can be removed in minutes for repair or replacement. All four fenders are of two-piece construction so the outside shell can be removed separately or with the inside liner as required for repairs. A new fender panel costs less than \$20 ready to attach and paint. Doors are two-piece construction somewhat like those on a Rambler, with the upper frame easily removable from the lower section. Because taxi doors are frequently damaged, Checker supplies exterior panels for about \$8.

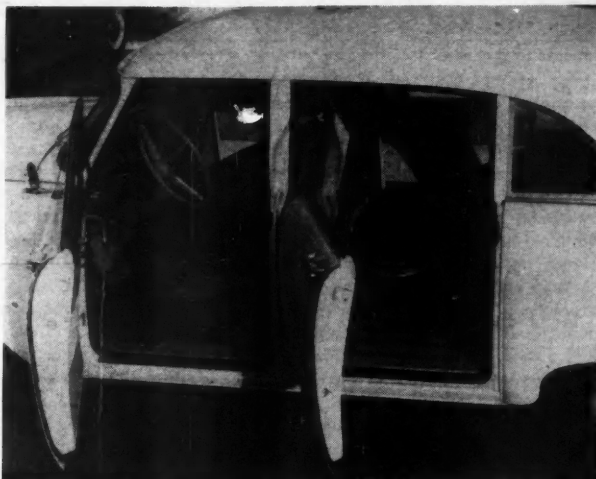
The optional (\$181.50) Warner Gear automatic transmission is a torque converter unit with automatic planetary gear train. It shifts through all three speeds going forward and offers an accelerator kickdown below 40 miles an hour. Selector positions are NEUTRAL, DRIVE, LOW and REVERSE. The optional Bendix Hy-

continued on page 42





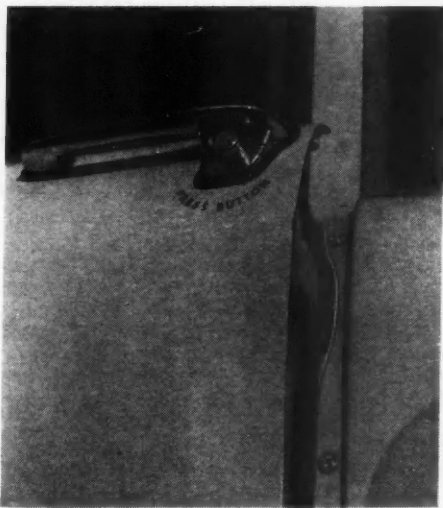
**CHROMELESS DASH** gauges are easy to read.



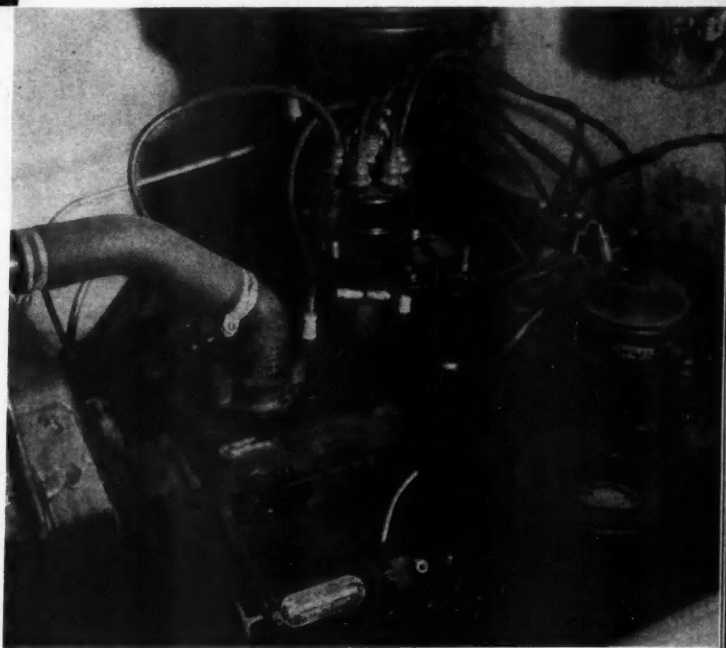
**HIGH, WIDE DOORS** make it easy for driver and passenger to enter and leave. Round, foam-covered extra seats fold flat when unused. Linoleum flooring has anti-slip strips at doors.



**IN PARKING LOT**, Checker is only slightly higher than '52 or '54 cars alongside. Shorter rear overhang aids in city driving and parking.



**DOOR LIP** conceals machine screws holding easily-removed fender panels to the body.



**CONTINENTAL SIX** is noted for easy servicing, with high-mounted accessories. Engine has 95 bhp.

## CHECKING THE CHECKER

continued from page 40

drovac power brake unit is mounted in the engine compartment. Power steering and a four-way electrically-operated front seat complete the power-assist list.

Unusual option is a low-compression (6.8 to 1) cylinder head for low-speed, low-grade fuel operation such as encountered in foreign countries. There is also an optional high-compression (8 to 1) head available. Other items include a complete 12-volt electrical system, roof-mounted two-way radio antenna, heavy-duty shock absorbers and studs, six- or seven-leaf rear springs, oil filter, tool kit and jack, back-up lights, right rear door remote-control lever, cartop luggage rack and a handy little buzzer that sounds off every time you shift into reverse.

We were fortunate in being able to test both models of the Checker: the A-8 with

lean out without bumping a careless head.

The distortion-free vision is great, with all fenders quickly counted from the driver's seat. Traffic handling is "sportscar-ish"—light, easy to flip about.

Brake pedal pressure, even with the power assist, is high compared to most other cars. Even at road speed the brakes require plenty of push. There seems to be little or no servo action, so you get as much out of them as you push in. Once you're used to it, though, the feeling is great, as the brakes have a solid non-fade approach to stopping.

The "shift yourself box" is no trouble—there's plenty of lever travel and wide gates that defy the most careless to miss a shift. Pickup is only fair; even then you must drive it like an import and wind the engine tight. The automatic reminds one of the early Chrysler Fluid Drives—lots of rpms, little action. But the automatic is smooth and for dense traffic would be a left leg saver. One important feature is

and stays in line. On rough roads it's noisy but solid. No body weave or steering wander, and the body rides level.

Wind noise or air leaks are practically non-existent. Bodies are double-sealed with plenty of thick rubber weatherstrip and undercoated at the factory. The heat and vent system is designed for year-around cab use in Chicago, New York and Baltimore. The heater should be more than adequate for use anywhere in the U.S.

In general, it rides much like a 1955 Ford. But veteran cab drivers swear it is less tiring to drive a Checker day in and day out than any new Ford, Chevrolet or Plymouth cab.

When it comes to servicing, Checker clobbers the field. Nothing could be easier. Everything in the engine room is on top. Fenders unscrew for rapid changing. There are lube fittings on nearly every movable part. Checker parts are stocked in depots throughout the nation, while items common to Detroit production are listed in

## What About the Rumored Checker Car?

A recent visit to the factory in Kalamazoo, Mich. uncovered little that could be published now. Checker's president Morris Markin provided a 20-minute interview which added up to his smiling remark, "Wait until you see it, then you'll really be surprised."

How surprised remains to be seen. Scuttlebutt from Markin's back shop has the new car being a revised version (designed by Ray Dietrich) of the Checker cab described here. Changes are supposed to include a higher-horsepower engine (rumored to be a Ford Six

of 223 cubic inches and 145 horsepower), more fashionable interior, a little extra chrome on the outside, restyled fenders for which dies are reported to now be in production, and a \$2500 price tag. Standard equipment at this price is supposed to include automatic transmission, power seats, brakes, steering and choice of colors. Not bad at all for a car that could last the average driver 15 to 20 years.

A conjecture on how the Checker Car might appear is offered in the drawings by one of our staff artists on the opposite page.

standard shift, and the Driv-er-Matic, a similar car with automatic transmission.

Getting into and out of both cars with their high, wide doors is pleasantly easy. Mother would have little trouble with an armload of groceries, three children, a dog and a busted shoulder strap.

Instruments and controls are not only convenient but easy to use. Gauges are fitted for amps, fuel, oil pressure and engine temperature. Defroster and light switch are on the left of some models; on others the defroster button is in the center of the dash, throttle and heater switch are on the right with a red light to indicate an open door. Optimistic touch is the 100-mph speedometer.

The car starts quickly on the first bounce. The combination of low compression ratio, heavy-duty electrical system and tiny carburetor makes starting a cinch.

Driving position is comfortable. The steering wheel is semi-flat like a pickup truck; the seats are high, firm and straight. Best of all there's plenty of head- and leg-room, plus doo: windows high enough to

lock-up in direct drive which eliminates fluid slippage.

When it comes to performance, we seldom found a road long enough to be sure we had either cab at top speed. A fair estimate would be 60 miles an hour on a level road, with no wind and a well-tuned engine. Acceleration is poor by the clock but adequate for most traffic conditions. The stick shift is a little hotter than the automatic, which panted from 0 to 40 in 11.8 seconds, then took almost 15 seconds more to reach 50 miles an hour. The Checker tires easily on hills. There just isn't any substitute for horsepower, and the 3685-pound sedan hasn't got much.

Luggage space in the usual trunk compartment is adequate—if a couple of suitcases are all you need. Checker has used its body space for two extra people.

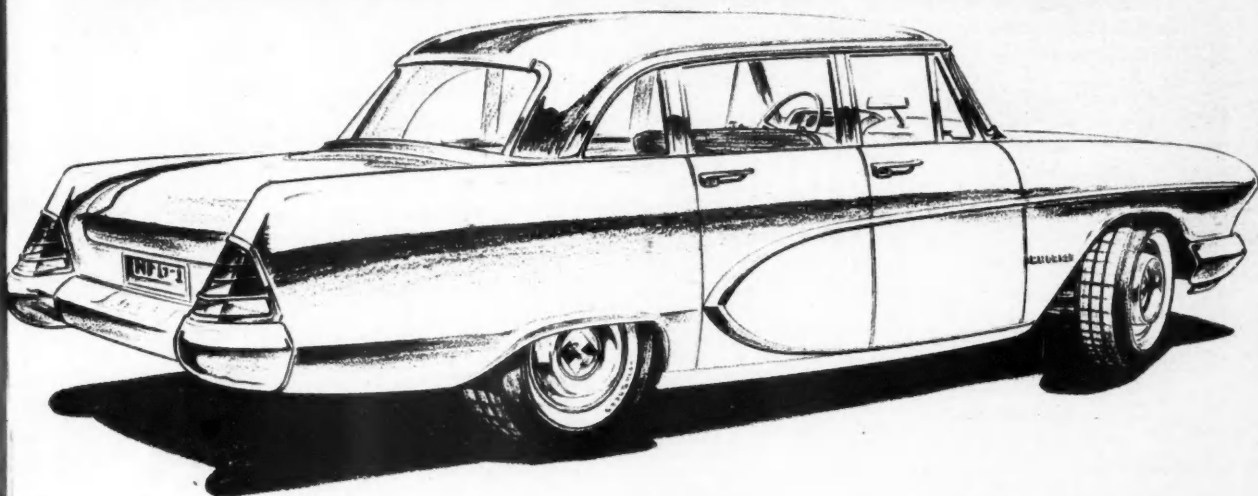
The Checker rides high (seven-inch ground clearance) but stiff springs and shocks keep the body fairly level. Bend it if you have to, the little sedan does a good safe job of emergency cornering. On straight roads it goes where you point it,

the Checker Shop Manual and are available from the nearest new car dealer.

For rough-and-tumble city driving with more than one passenger, Checker has no peer. Kids can't hurt it and elderly folks appreciate the flat floors and wide-opening doors. If your driving is rather erratic, the easily repaired sheet metal should save money. Gas mileage is pretty good. When used as a taxi, in continuous stop-and-go driving, the Checker (with either transmission) averages 12-13 mpg.

Before you decide to buy a Checker, consider your intention to keep it for a long time. Checkers are not trading material, have no ready resale market (except to a cab company), and would depreciate a lot or a little, depending on your buyer. They just won't wear out, as testified by 150,000-mile Checkers still bounding merrily from curb to curb in our largest cities. You might query the local bank to be sure they will finance a Checker, but don't waste time looking for a dealer. There are none. Checkers are sold only from the factory in Kalamazoo. /MT

## ... and here's what we think the Checker Car might look like



**A MAJOR FACELIFT** will be necessary when the Checker Car hits the market to compete with the majors. The public will like Checker economy, but will demand style, too. Manufacturing economics dictate retention of the basic taxicab body, top and doors, but fenders, deck, hood and hardware are more easily changed. With this in view, here is an artist's concept of what *could* take place. The front and rear have both been lengthened, proportionately lowering the roof line which attains an illusion of lightness through use of massive chrome moldings above the drip rail and rear light. The body side molding, reminiscent of several popular cars, achieves a good break-up of the overly flat door panels. Hood and deck lines are lowered by use of upswept lips leading to the respective windows. Quad lights and a checker grille dominate a conservatively styled front-end treatment.



CURRENT CHECKER CAB





Adopting a special-mix red as a color trademark, the Bailon Custom Shop has won top national awards for five out of seven entries . . . and the title —

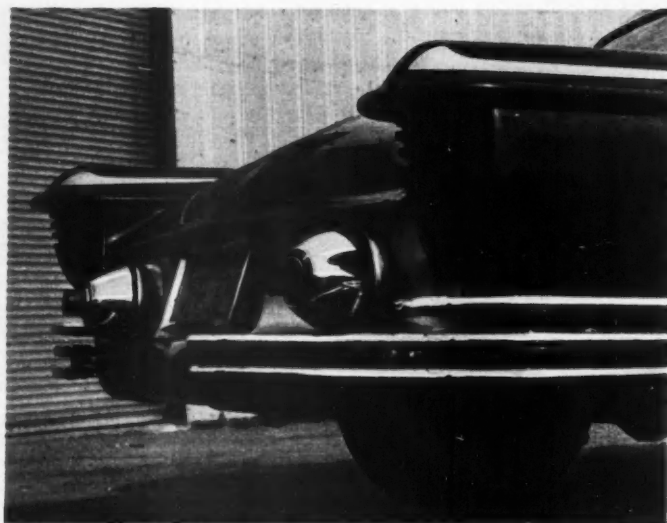
## candy-apple



*Photo Story by James E. Potter*

**B**ETWEEN 1952 AND 1957, Joe Bailon's uniquely restyled customs have won the top national award at the Oakland Roadster Show (considered one of the best displays of customs on the entire West Coast) for an amazing five times. Now, with better than \$50,000 invested in his seven-year-old custom shop at Hayward, Calif., he is credited with many customizing firsts, including airscoops, power-adjusted front seats, and the exclusive candy-apple paint mix — the only color he uses. The 12-coat lacquer job gracing the T-Bird on our cover (and shown here) cost \$250 and is guaranteed to last at least two years. The '41 Chevy custom at left was his first national award winner. In this year's shows, he hopes to win again; on the following pages are some of his entries.

## CUSTOMIZER



REAR FENDER has been extended and capped over the special '53 Lincoln tail lights. Exhaust stacks have been moved inboard. Joe Bailon won "Best Designer of Year" award with this car at the recent Portland, Ore. Custom Car Show. Cost: about \$7500.





SPECIAL-MIX CANDY-APPLE PAINT on Joe Castro's T-Bird is relieved by gold scalloping of conservative design by Joe Bailon. Front end features grille made of conduit bar stock, twin conduit bumpers, quad headlights in hand-formed shell, and chrome teeth inserted in hood scoop and dual fender scoops. Note side exhaust stacks.

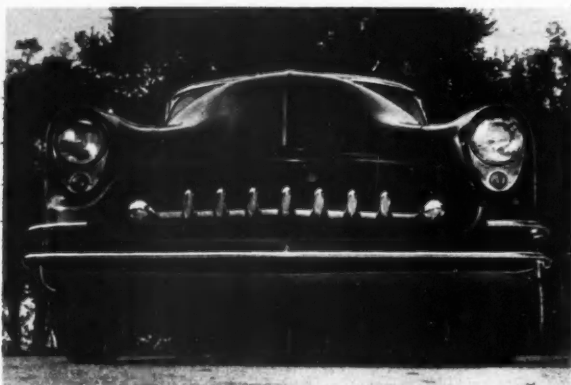
continued



HANDFORMED CONDUIT is used again for the rear bumpers. Wheels have been reversed and special bullet-type hubcaps installed. The '55 T-Bird has been lowered by channeled "A" arms at front, four-inch blocks, "C'd" frame and tunneled driveshaft at the rear. Interior has red and white Naugahyde upholstery with matching red and white custom rugs. Doors, trunk and hood are all electrically operated. Car could well be a winner at this year's shows.

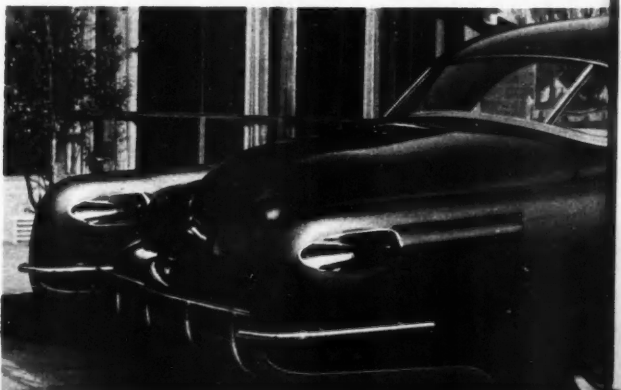
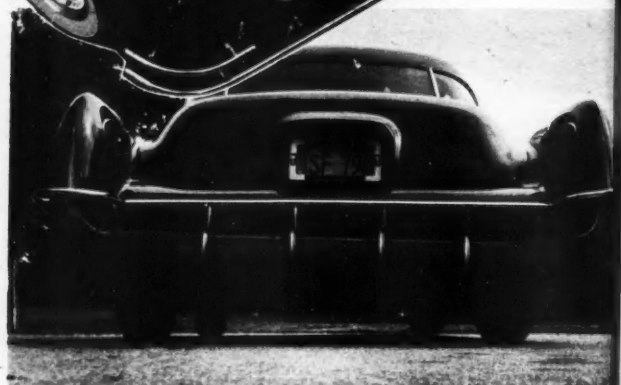
## CANDY-APPLE CUSTOMIZER continued

EYE-CATCHING CUSTOM around the Oakland, Calif. area is Dave Murdock's '50 Chevy coupe. Bailon designed all restyling.

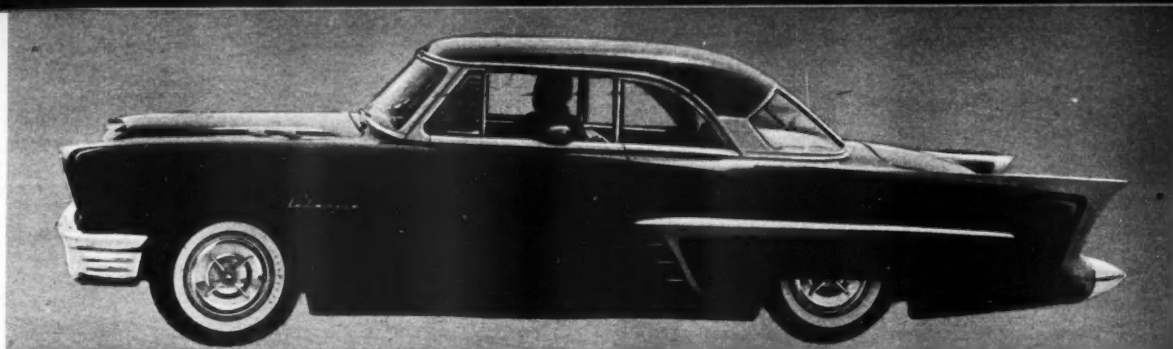


FRONT-END APPEARANCE was drastically changed by grafting '53 Buick fenders onto Chevy frame, installing '53 Buick headlights, sculpturing and reshaping the grille opening, and inserting '53 DeSoto grille "teeth."

REAR-END TREATMENT features extended rear fenders, reshaped to accept twin Corvette tail lights on either side of each fender. The custom has been sectioned a full six inches, lowered in front by cutting springs, in back by lowering blocks. Bailon again used chromed conduit for bumpers, shaped to encircle fenders and with other pieces dropping around bottom of rear deck. Car also has unusual rear fender airscoops, side exhaust pipes, a recessed rear license plate pocket, reverse wheel rims, electrical pushbutton hood and rear deck.







LA LANCIA is name given this '52 Mercury custom. To give it that long, low look both front and rear fenders have been extended, and car has been dropped four inches front and rear. Rear fenders are three inches higher, 26 longer, 3 1/2 wider.



CANTED REAR FENDERS with pointed ends house '55 Packard tail lights. Grille below rear trunk is handformed and chromed bar stock. Lower part of rear fenders is rolled in half circle, housing '56 Cadillac front bumper cut down. Front bumper is combination of '55 Buick, '55 Chevy and '52 Mercury components. All door corners have been rounded, handles removed and replaced with solenoids. Bottom of front fender is frenched over bumper and all seams filled. Scoop is built into hood.

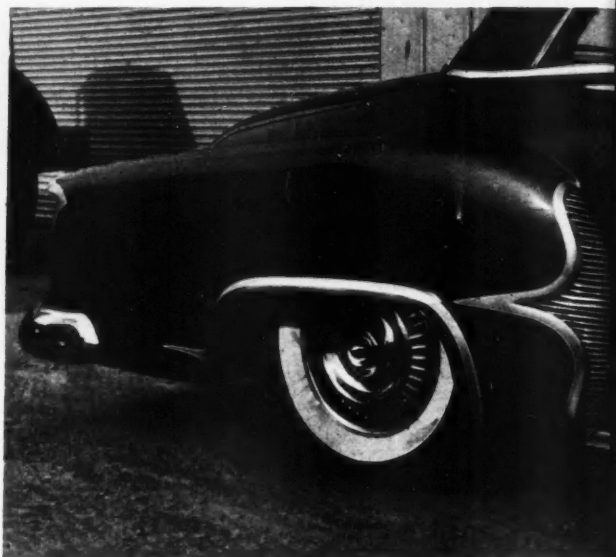
continued





**REAR FENDERS** are extended 14 inches into which Chrysler tail lights are installed, frenched in. Two-piece Pontiac rear bumper, handformed rear gravel pan with license plate box in the pan, and a gold trim are featured.

## CANDY-APPLE



**SPECIAL ORNATE SCALLOPING TREATMENT** has been given rear fender scoops, handmade out of horizontally installed round rod and chromed. Rods are frenched in. Nicknamed "The Beak" because of its unusual open-mouthed shroud around the headlights, Eddie Damerai's '49 Chevy is truly bizarre. Bailon Custom Shop did work.

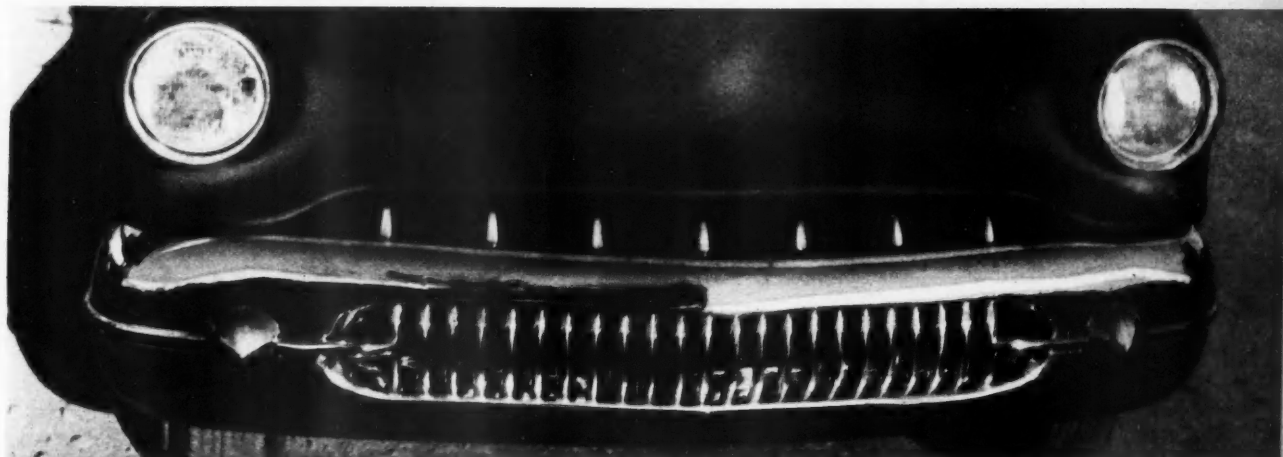


## CUSTOMIZER continued

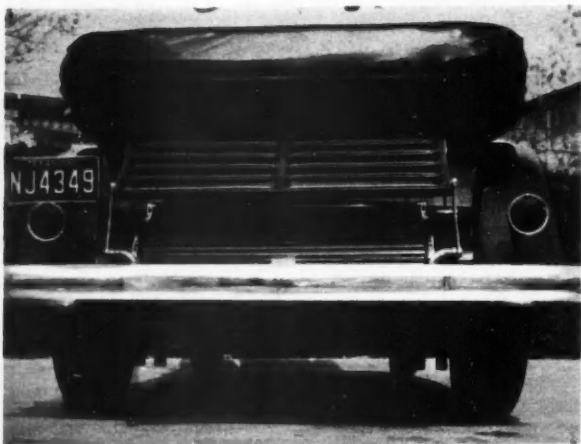
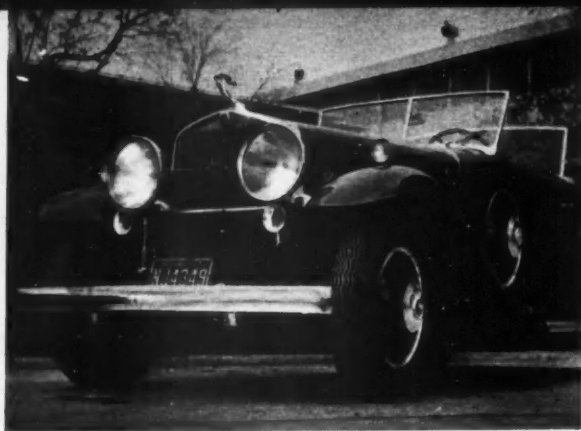


REAR BUMPER SECTION is inserted into molded shell of a '50 Ford custom that Bailon hopes will take trophies at forthcoming West Coast custom shows. Note modern sculpturing of rear fender. Front will have quad lights.

EXCELLENT EXAMPLES of Bailon's front-end design work are shown at right and below. In upper car, note three bullets in center of grille. Outside the handformed guards Bailon has inserted three floating-type chrome guards. The '51 Ford Victoria (center) features Cad bumper bullets in molded shell directly in line with the headlights. Thin horizontal bar floats in contoured grille shell. Grille teeth are inset above the frenched bumper in photo below, and another grille consisting of vertical chrome bars has been welded into the bumper oval.







## Double-Cowl CADDY

*Photo Story by Mel Martin*

**T**HIS 1930 CADILLAC was among the first of the V-16s made during the classic days of the Great Depression. It has a 149-inch wheelbase but occupies a foot less space in the garage of its owner — Houston industrialist Charles M. Knipe — than does the 133-inch-wheelbase '58 Cadillac 60 Special in the adjoining stall. Despite its longer wheelbase, the older car has much less overhang.

The double-cowl sports phaeton tips the scales at over 6000 pounds, and was priced, when new, at slightly more than \$1 per pound. Its 16-cylinder powerplant develops 185 horsepower at 3400 rpm. The engine will run nicely on either of its two banks of eight cylinders, equipped with pushrod-actuated overhead valves with hydraulic lifters. A compression ratio of 5.7 to 1 enables the big car to fare quite well on a diet of regular gasoline.

A massive distributor, containing a 16-sided rotor cam, provides a smooth spark flow to the 453-cubic-inch engine. Bore is three inches; stroke, four inches. Dual carburetors, one for each bank of cylinders, are air-fed through intake silencers and air cleaners remotely located on the firewall. Dual exhausts were included as standard equipment, as were dual tail lights.

The 120-mph speedometer on the driver's instrument panel is matched by a second unit mounted in a hand-carved walnut panel for the rear seat occupants. Alongside this back-seat driver's speed gauge is a stop watch. A more conventional eight-day clock is mounted in the front panel.

/MT

**BACK-SEAT DRIVERS** were obliged with their own speedometer and stop watch in walnut panel beneath crank-operated rear cowl.



# SPORTS-CAR ZOOM!



Coupe de Sport only \$2,499 P.O.E.  
Western states, slightly higher.

# FAMILY-CAR ROOM!

**INTRODUCING**—the brightest new performers on the '58 horizon! Now, for the first time, here's sports-car performance combined with family-style comfort.

These new Sunbeams, developed from successes in European rallies and the world-famous Mille Miglia Road Race in Italy, herald an exciting new era in American motoring.

Test-drive today the car that many internationally-renowned drivers rate as their first choice for a personal car—drivers who accept no compromise of quality, yet who demand the kind of response that measures up to the best any sports car has to offer, plus room for family and luggage, too!

And in no other car in Sunbeam's price class do you get so many extras at no extra cost! To name just a few: dual carburetors, full-flow oil filter, single-unit construction of body and frame for extra safety, turbo-slotted wheel discs, race-proven brakes and transmission, foam rubber seats, comprehensive sports car instruments—including tachometer, and 2-speed electric windshield wipers.

So if you've had a yen to step up to a sports car... and take the whole family along... you'd better hustle right down to your Hillman/Sunbeam dealer's. It won't be long before there's a waiting list for these two beauties!



3-Position Convertible just \$2649 P.O.E.  
Western states, slightly higher.

# '58 SUNBEAM RAPIER

A ROOTES PRODUCT

Rootes Motors, Inc., 505 Park Avenue, N. Y. C., N. Y. • 9830 W. Pico Blvd., L. A., Calif.  
In Canada: Rootes Motors (Canada) Ltd., Toronto, Montreal, Vancouver

# Faster, safer way to wash your car



Du Pont Car Wash gets your car so clean it drains dry, without *wiping*. Unlike ordinary detergents, it's safe for wax and it doesn't streak! At service stations and auto supply stores—½-lb. can only 75¢.



BETTER THINGS FOR BETTER LIVING  
... THROUGH CHEMISTRY



## DU PONT CAR WASH

### 2<sup>top</sup> Trend CAR Books for you!

75c each at newsstands now!  
(Or clip and mail coupon below, today!)

#### MOTOR TREND'S HANDY CAR HINTS



#### Motor Trend's HANDY CAR HINTS

A trouble-shooter par excellence—filled with fresh, practical answers to universal automotive problems. Designed to aid the everyday driver, it covers such points as utilization of car space, hot and cold weather driving, gas and oil, tires and tubes, lights and sight, the engine, the body—inside and outside, safety driving, family driving—with emphasis on comfort and conveniences like pet carriers, etc., garage and driveway accessories and storage tips, and highway driving. Plus hundreds of gadget and gimmick ideas for your car. It's a book you'll want to keep in the glove compartment—and use—at all times.

#### TREND BOOKS

5959 Hollywood Blvd., Los Angeles 28, Calif.

Enclosed is \$..... @ 85c each  
(includes postage, handling, etc.) for  
which send me the following books:

- ☐ '58 CARS OF THE WORLD  
☐ HANDY CAR HINTS

NAME.....

STREET.....

CITY.....

ZONE..... STATE.....

#### 1958 CARS OF THE WORLD



For the fifth straight year, this popular annual presents a parade of the new cars produced the world over. It's a complete guide to every production car built for 1958, containing photos, specifications and prices on over 200 models from all nations. This year's edition highlights a new special feature: a group of outstanding articles on the most revolutionary automotive

developments of our day, such as air suspension, torsion bars, fuel injection, etc. Other 1958 "firsts" include several exclusive road tests of world-wide makes, and full details on twelve cars never before featured in the CARS OF THE WORLD series.



## SPOTLIGHT ON DETROIT

continued from page 10

Stainless Steel Producers of the American Iron & Steel Institute participated in the engineering display coincidental with the recent S.A.E. annual meeting in Detroit.

**BUMPER AND GRILLE** and headlight retainers in a finished mock-up of the sort of front-end styling we may expect in a year or two made up the most impressive part of the display. If the front end shown is any indication of things to come, we may see overall heights dip to new lows. The distance from the bottom of the bumper to the top of Fiberglas hood was several inches lower than that of the lowest '58 car. For the first time solid stainless steel is being considered for bumpers. A prototype stainless-clad bumper for the '58 Mercury was displayed at the meeting. The Institute has made other bumpers of solid stainless steel, Type 430. Chrome plays a part, as do nickel and copper, in making stainless steel. Inasmuch as chrome is actually porous, present thinking is that a coating of 10 per cent of Type 302 stainless on each side of bumpers made of mild steel may provide the best answer to corrosion and scratch problems (see page 71)

**STUDEBAKER-PACKARD** is extending the *Scotsman* name to include a new very low-priced pick-up truck said to be priced below that of any other manufacturer.

## SHARE THE PROFITS?

continued from page 20

in the cost of living. This rise in the general industrial price level and cost of living is producing some alarming results. The decline in car exports and rise in car imports is evidence of what is happening in the automobile industry. Auto workers need to know that a continuation of the pattern-chain-reaction bargaining will price American car manufacturers further out of the domestic and foreign car markets. Recent studies of car manufacturing costs at home and abroad show that automobile production costs are now lower in several foreign countries."

**Q.** How do unions cooperate in improving quality of workmanship by their members?

**A.** A spokesman for American Motors said, "Mr. Romney has often claimed that 'Cooperation from local unions has greatly improved our product quality. Our dealers tell us that; there is no more reliable source for comments on quality.' /MT

Announcing a great NEW magazine!

## GUNS&AMMO

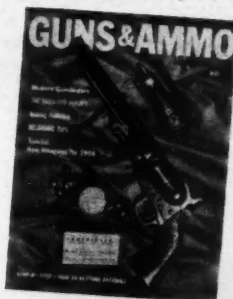
**MODERN GUNSLINGERS •  
THE FABULOUS PURDEY •  
HUNTING BALLISTICS •  
RELOADING TIPS •  
NEW WEAPONS FOR '58 •**

**50c at all newsstands now!**

Or mail 60c (to cover postage, etc.) to:

**PETERSEN PUBLISHING CO.**

5959 Hollywood Blvd., Los Angeles 28, Calif.

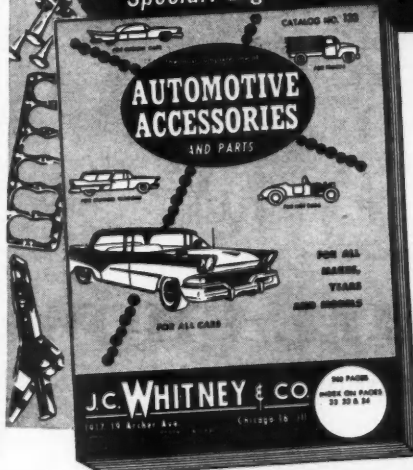


See J. C. Whitney's Complete Automotive Selection  
Before You Buy Anywhere Else!

# FREE

## 244 PAGE-75,000 ITEM AUTOMOTIVE CATALOG

Savings Up to 50% • Parts of Every Description  
Quality Guaranteed or Money Back • Same-Day Shipment  
Special! Big Selection of 1958 Items Just Out



Nowhere else will you find such a complete, up-to-the-minute selection of top quality auto equipment! And at such rock bottom prices! Send the coupon and get this gigantic new 244 page catalog—the world's largest automotive buying guide. See for yourself how you can save UP TO ONE-HALF on your every automotive need.

Includes thousands of brand new last minute releases for your stock car, hot rod, custom car, truck or station wagon. Be first with the latest equipment you can't find in stores yet. Also features new High Speed Parts... plus hard-to-find exact replacement parts for cars from early models to the newest 1958 models.

• Newest Custom Equipment • High Speed Parts • Tires and Batteries • Tremendous Stock of Dual Exhausts • Radios, Heaters and Air Conditioning • Lifetime Convertible Tops • Oil Filters • Replacement and Custom Trim for All Cars • Fender Skirts • Continental Kits • Ignition • Headlamp Rims • Dual Headlights • Engine Adaptors for Late Overhead Valve Models • Huge Selection of Seat Covers • Stock and Replacement Parts

## FREE—Mail Coupon Now!

J. C. Whitney & Co., Dept. O-4  
1917 Archer Ave., Chicago 16, Ill.

Rush your giant 244 Page Catalog showing over 75,000 items at lowest prices. I enclose 25c to cover mailing and handling cost (refunded me on first \$5.00 order). Offer good in U.S.A. only.

Name

Address

City  Zone  State

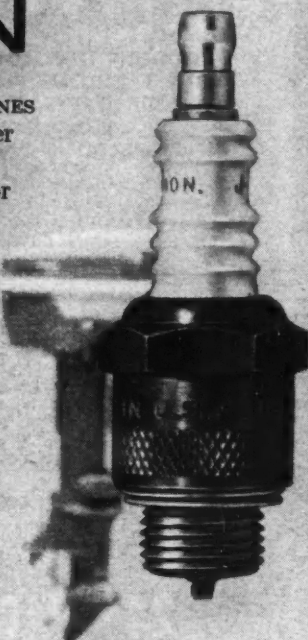
J. C. Whitney is America's largest seller of automotive equipment and has been for nearly a quarter of a century. Our huge volume and direct by mail selling plan enable us to eliminate the middleman and pass on the enormous savings you'll see in our catalog, directly to you. Our years in business and hundreds of thousands of satisfied customers in all 48 states mean that you buy with confidence when you buy at J. C. Whitney. All rebuilt as well as new parts guaranteed for six full months. Absolute satisfaction on every order or money back. Mail coupon and see. Enclose 25c in coin to cover mail-handling costs (refunded on first \$5 order).

**J. C. WHITNEY & CO.** 1917-19 (O-4) Archer Ave.  
Chicago 16, Illinois

# CLEAN



OUTBOARD ENGINES stay clean longer with Bardahl Outboard Motor Oil. Get extra power at top throttle settings... trouble-free operation at low trolling speeds. Also, excellent for power mowers, chain saws, and other fuel-lubricated motors.



**BARDAHL:** World's No. 1 Seller—Available everywhere

AMERICA'S MOST SPECTACULAR

AUTO SHOW!

## 1958 international AUTOMOBILE SHOW

APRIL 5-13 • COLISEUM • NEW YORK CITY

### SEE The World's Greatest New Cars!

From England, France, Germany, Italy, Sweden and United States... dream cars, sports cars, economy cars, luxury cars, experimentals... the best autos America and Europe have ever produced... most shown for first time anywhere!

### EXPLORE Fascinating Exhibits!

New motor scooters, motorcycles... automotive accessories and parts.

*Don't miss the most comprehensive and exciting auto show ever held in the U.S.!*

## Pontiac . . .

. . . with four-speed box

continued from page 11

floor stub controlling the Hydra-Matic. Not so, said he and handed over the keys. Exactly four minutes later we pulled onto a wide, open highway, stuffed a foot in the carpet and had 50 as quick as it takes you to read this. A pop shift to second, then into third at 85. There just wasn't enough road in the area. Like popcorn, it was so good I had to have more. For nearly an hour I played with the big coupe and its stubby little shift. Without half trying it was easy to squeak rear tires between first and second and between second and third. Not bad for a 4400-pound car. It was a happy ride, with the "A" engine providing both instant response and a most amazingly smooth power output right up to peak in the lower two gears. But don't run out to order one. This was a custom installation, though we did ask the factory if they would make them up to order for MOTOR TREND readers.

The answer: "Not at present. However, if enough drivers wanted a four-speed box we might offer them as an option for 1959."

Hope springs eternal, so we cornered the man responsible for the installation and picked his brains for your benefit. First off you need the 29-pound 1957 fly-wheel (the '58 weighs 38 pounds) which mates with a 10½-inch Borg and Beck centrifugal clutch (Part No. 531627), offered as a service part by Pontiac. At the local Chevy dealer, promote a four-speed transmission plus shift pattern plate and ash tray which sits on the floor hump. The four-speed box bolts right onto the bell housing of the Pontiac V8. This sounds easy, and is. The hard part follows.

The transmission hump in the floor must be modified to clear the new transmission (which can only be installed in a bucket seat Pontiac—no room if the bench seat is installed). The really rough job is shortening the front driveshaft (about four inches off the front end) and machining it to fit the transmission while keeping the thing in perfect balance and concentricity. This job isn't easy. Three shafts went down the drain, on the installation we drove, before a good one was made that ran without vibration. We're told that alignments of the Pontiac drive-shafts and center support bearing are most critical, so if you tinker, do it right and save trouble in the long run.

Should you want a little more go than you've gotten from your Pontiac, check these modifications out with your bank account. For little more than the cost of an automatic transmission you can get the "A" engine in a new car. Or, for less dollars and more work, fit the parts to anything from a '55 Pontiac to date.

—William Carroll

Gas sure lasts  
in this **English** car!

And it's got  
real **FORD** "go"!



Costs you hundreds less than most  
low-priced cars ... and gives you up to 35 miles per gallon!

English Ford Line engines are extra thrifty on gasoline ... need only regular grade. And they give you lively Ford performance, with power to spare! Service anywhere because nuts and bolts are Ameri-

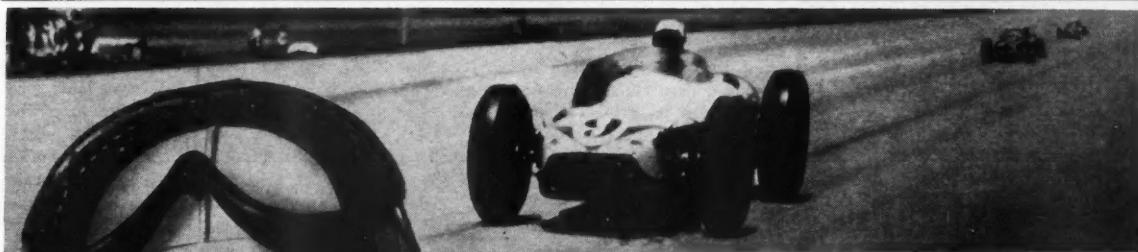
can sizes. American-type gearshift, too—nothing new to learn. See the English Ford Line at your dealer's today.

Made in England for Ford Motor Company, Dearborn, Michigan, and sold and serviced in the United States by its selected dealers.

Lowest priced  
"Anglia" model  
carries four big  
people in comfort



SEE THEM AT THE INTERNATIONAL AUTOMOBILE SHOW, APRIL 5-13, N.Y. COLISEUM, SPACE 14



"Raybestos Brake Linings always lick  
HEAT and WEAR brake problems for me"

—says Sam Hanks, "500" winner

In winning the 1957 Indianapolis "500" Sam Hanks used his brakes about every 30 seconds for almost 4 hours. Reports Sam: "When I'd get caught in a jam doing 170 or when I'd slam into those turns at about 150, my brakes always responded instantly. We checked the linings at the end of the race. There

was only fifteen thousandths of an inch wear."

You too can lick dangerous heat and wear brake problems with the brake lining that Raybestos manufactures for every make and model car. Protect yourself under *all* driving conditions. Enjoy really positive brake safety with Raybestos.

RELINE WITH

**Raybestos®**



RAYBESTOS DIVISION of Raybestos-Manhattan, Inc., BRIDGEPORT, CONN.

AMERICA'S BIGGEST SELLING FRICTION MATERIAL

RAYBESTOS-MANHATTAN, INC., Brake Linings • Brake Fluid • Brake Blocks • Clutch Facings • Industrial Rubber • Mechanical Packings • Asbestos Textiles • Engineered Plastics • Sintered Metal Products • Rubber Covered Equipment • Laundry Pads and Covers • Abrasive and Diamond Wheels • Industrial Adhesives • Bowling Balls

MOTOR TREND/APRIL 1958 55



## TONNEAU COVERS



CORVETTE

- PORSCHE • MG • MERCEDES 190SL
- ALFA ROMEO • THUNDERBIRD • JAG
- AND MOST POPULAR SPORTS CARS
- Late model American Convertibles

Highest quality materials—Custom Styling  
Write Dept. MT-4 for illustrated brochure.

ROBINS AUTO TOP COMPANY

1453 Lincoln Blvd. Santa Monica, Calif.  
Tel. EXbrook 3-3315

## ENGLISH FORD PARTS

- We have the largest stock of parts for English-built Fords in the United States covering all models—Anglia, Perfect, Thames, Consul, Zephyr and Zodiac.
- Orders shipped same day received. Ask for part needed by year and make.
- Write, wire or phone John Fisher, Webster 3-5911

HOLMES TUTTLE FORD

7122 Beverly Blvd., Los Angeles 36, Calif.

## ENGINES "Sing"!

WITH **MILESMASTER®**



FUEL  
PRESSURE  
REGULATOR

For smooth running, quick starting, better mileage... install a genuine MILESMASTER. Prevents flooding. Only \$6.95.

MILESMASTER, INC., Dept. L, Exeland, Wisc.

## TRAINED MEN NEEDED!

IN INDUSTRY—ARMED FORCES  
BIG PAY!—GOOD FUTURE!

- ☐ DIESEL ☐ ELECTRONICS
- ☐ AUTO ☐ AUTOMATION

NEVER BEFORE has the opportunity been so good for the properly trained mechanic and technician to step into BIG PAY POSITIONS with rapid advancement and future security virtually assured.

YOUR SUCCESS depends on the quality of training you receive... and the reputation of the school you attend.

YOUR GUARANTEE we are giving the best in mechanical and technical training is proved by the fact... High pay jobs in industry, and ratings in the Armed Forces now waiting for our graduates.

RESIDENT SHOP TRAINING is easier and costs less than you may think! We provide you with housing and part-time jobs while in school, plus free nation-wide placement service for graduates.

Check subject above in which you are interested and mail for

FREE BOOKLET

**BAILEY**  
Technical Schools

Veteran Approved  
1623 Grand, St. Louis 4, Mo.

Home \_\_\_\_\_ Age \_\_\_\_\_  
Street \_\_\_\_\_  
Town \_\_\_\_\_ Zone \_\_\_\_\_ State \_\_\_\_\_

## HANDY hints

by Rodger Darling

**THE WELL-DRESSED DRIVER**—For the man who is in and out of his car all day in all weather, garment experts recommend suits of "twist, homespun, or other rugged cloth..." Hard-finished worsteds wear well and resist wrinkling but some, such as serge and gabardine, get shiny from frequent sliding behind steering wheel. Softer worsteds, including sharkskin and cheviot, resist shine. Tweeds and shetlands won't wrinkle, but neither do they keep press, and although rugged, nap is apt to rub off trouser seat and coat back.

**LOOK UNDER FLOOR MAT**—it may surprise you! Though you lavish care on your car's exterior, the usually-neglected flooring can undermine its condition and value. Water blasted through seams from street puddles is sealed in by the rubber mat and soaked up by the floor padding, causing rot and rust.

Remove floor covering—held in place by molding and clips—being careful not to tear around pedals. Don't forget trunk mat. Dry soggy padding in the sun. Clean and dry the car's metal flooring, then sand and paint rust areas and caulk open seams. Look for drain outlets plugged by undercoating, or drill a few small holes in lowest places.

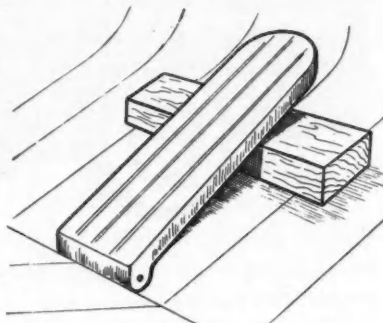
A dry car smells fresher, feels warmer, and stays new longer.

**STRONGER BUT WEAKER**—You new-car owners with 12-volt batteries shouldn't imagine you have "twice as much" electricity as with your old six-volt battery. True, you have double the voltage, but you have less reserve, as a comparison of "ampere-hour" ratings will show. Because a 12-volt battery needs twice as many cells in a case not much bigger than a six-volt, the cells are consequently smaller, have fewer plates, and thus run down sooner.

Of course, the generator restores normal usage but 12-volt owners should practice moderation and be especially alert against

corrosion collecting on the battery top, which can cause discharge of a 12-volt battery four times faster than a six-volt.

**A QUICK PERFORMANCE TEST**—Here's how to make a simple but graphic "before and after" check of engine performance when you are trying out new plugs, tuning up, or "freeing up" a brake you suspect of dragging. Chock the front wheels and jack up the rear end, setting the axle firmly on blocks. Release brake, start engine, shift into high, and secure a piece of wood under the accelerator, which will allow the pedal to be depressed only to a certain point (between

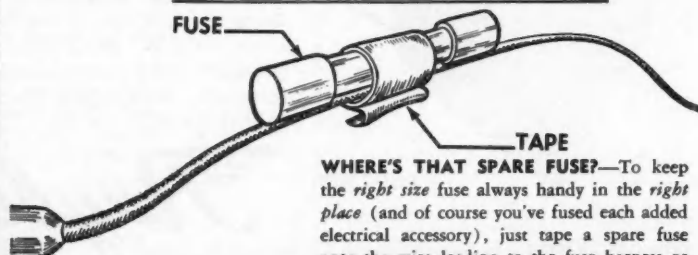


25 and 35 mph). Note this exact speedometer reading carefully.

When you have completed your job, depress the accelerator to the wood block again. A higher mph reading will show that you have made an improvement, getting more mileage out of the same gas pedal "push."

**"X" MARKS THE SPOT**—It's easy to locate even the smallest leak in an inner tube by watching the flow of bubbles from the partly inflated tube submerged in water. But by the time the tube is dry and buffed it's pretty hard to find that pin-hole again for accurate patching. To avoid this difficulty (not to mention the eyestrain), mark a three-inch cross with indelible pencil. This will show you exactly where to center the patch.

**CLEAN WHEELS**—After plowing through the slush, goo and gumbo of late winter and early spring, be sure to scrape off all dirt still stuck to your wheels, especially on those hidden inner surfaces. Even a small lump of hardened mud will unbalance a wheel enough to cause noticeable vibration at speeds as low as 40 mph.



**WHERE'S THAT SPARE FUSE?**—To keep the right size fuse always handy in the right place (and of course you've fused each added electrical accessory), just tape a spare fuse onto the wire leading to the fuse harness or junction box (see sketch).

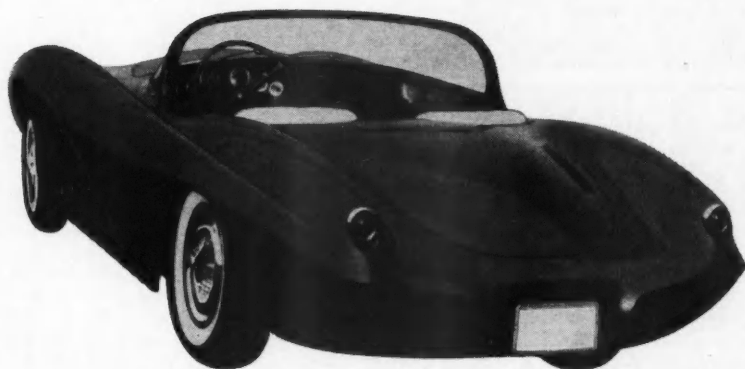
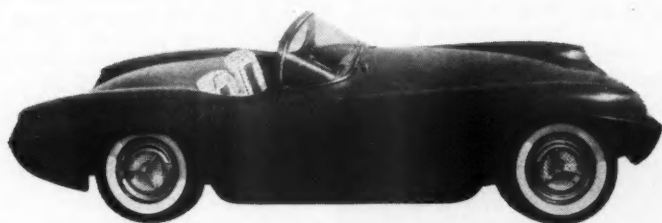


## MEET THE CONQUEST

**B**ORN IN CANADA, but now being manufactured in California, is a new Fiberglas body which incorporates a number of unique features. The "form should follow function" theorists will derive great satisfaction from this design. All body lines are a series of compound curves which are intended primarily to provide the body with an inherent stiffness. The result has been not only an extremely rigid body but also one that is highly pleasing to the eye. To add even greater stiffness, a box-section brace extends from the dash to the floor. The

sharply raked windshield has a roll bar incorporated into the frame and coupled with the excellent aerodynamic characteristics of the body provides a cockpit which is remarkably free of side drafts and turbulence. The Conquest is manufactured by LaDawri Coachcraft, Box 2501, Long Beach. It is sold as a shell for \$395 without the door, hood or trunk lid cut-outs having been made. A finished job ready for final painting sells for \$595. The body will fit any properly modified chassis having a wheelbase from 98 to 104 inches.

—R. C. Scollay



THE CONQUEST is also available as a semi-complete car, less the engine and transmission. This version includes a tubular frame, suspension system, driveline components and other major parts. The price assembled is \$995.

**AT LAST!**  
The Famous HEDMAN HEDDERS design  
is now available for  
**1957 PLYMOUTH V8!**

Now... you can  
get that 10%  
increase in  
Horsepower



Install  
HEDMAN  
HEDDERS  
on your 1957  
PLYMOUTH V8!

ALSO AVAILABLE FOR  
1955-57 FORD - MERCURY  
CHEVROLET

**HEDMAN  
HEDDERS**

SEE YOUR DEALER TODAY

CHICAGO, ILL. 60641  
CHICAGO, ILL. 60641  
CHICAGO, ILL. 60641

## BE AN INDUSTRIAL DESIGNER...



Combine your design abilities with technical aptitudes in Industrial Design training at Art Center School. Work under practicing professionals for top jobs as automotive stylists, product, package designers. Constant demand for graduates. 700 students. Fully accredited. Year-round training. New terms Feb., June, Sept. Apply early.

Write Mr. Tows, 5353 West Third Street, Los Angeles, Calif.

**ART CENTER SCHOOL**

**MT's**

## "NEW LOOK"

MAY 1958

**SPORT  
BODIES**

**\$295 And  
\$495**



3 Models Easily  
"Bolt-On" Any Car!  
Lifetime Fiberglass!

**FREE!**

INFO or send 25c  
for Photos and  
CAR-A-LOG!

ALMQUIST ENG. • Dept. MTS-4 • MILFORD, PA.

**BIG PAY JOBS**

for men who qualify in

**DIESEL**



### TRAIN NOW FOR A DIESEL FUTURE

Steady, high-pay jobs await men qualified in Diesel, Tractor, and Heavy Equipment. Are you qualified for job and advancement opportunities in this fast-growing field? You can qualify!

### COMPLETE DIESEL COURSE NOW AVAILABLE

If you are ambitious and want to get ahead in this big money field, you'll want to know about the complete Diesel home training course now offered by Interstate Training Service. Covers all phases of operation, repair, service. Easy to master in spare time. No interference with present job. Up-to-the-minute. Regularly revised to cover new developments. We invite comparison of material offered. Advisory placement service for students.

**YOU OWE IT TO YOURSELF** to investigate Interstate Training Service Diesel Training. Thousands agree it has helped them to better jobs...better pay. It can do the same for you!



**WRITE FOR FREE INFORMATION TODAY!**

**INTERSTATE TRAINING SERVICE**

Dept. A-29, Portland 13, Ore.

Please see that I receive FREE 24-page book,  
"Getting Ahead in Diesel."

NAME \_\_\_\_\_ AGE \_\_\_\_\_  
ADDRESS \_\_\_\_\_  
CITY \_\_\_\_\_ ZONE \_\_\_\_\_ STATE \_\_\_\_\_



All over the world

## King of the Road!

### LUCAS original equipment for all British Cars

British car owners all over the world know the Lucas symbol...their *guarantee* of the finest possible quality in lighting and ignition equipment — and famous Girling brakes and shock absorbers! *Standard* for the majority of British made cars, Lucas equipment demonstrates its unmatched dependability time after time.

So to maintain peak efficiency in your British made car be sure to *replace Lucas with Lucas!* You'll find Lucas replacement parts in stock at better garages and British car dealers throughout the United States. Ask your dealer to show you the *entire* line of Lucas "King of the Road" deluxe accessories.

*Right from the start... Right for replacement!*

Represented in the United States by

### LUCAS ELECTRICAL SERVICES, INC.

501-509 W. 42ND ST., NEW YORK 36, N. Y. and  
3025 W. JEFFERSON BLVD., LOS ANGELES 16, CALIF.  
GENERATORS • STARTERS • DISTRIBUTORS • COILS • BATTERIES  
LAMPS • WINDSHIELD WIPERS • REGULATORS • HORNS  
GIRLING BRAKES AND SHOCK ABSORBERS

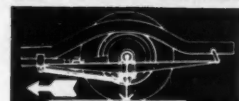
## Traction-Masters GUARANTEE SAFER STOPS - QUICKER STARTS - BETTER RIDING OR YOUR MONEY BACK!

These amazing torque bars, easily installed, provide a positive connection between springs and frame, giving new firmness to the rear end. Upward forces that cause dips, dives and sway are converted to down-bearing forces keeping wheels on the road, springs level, equal braking action to all wheels. Result: quick, level starts and stops, greater traction in rain, mud or snow, long car and tire life, easier handling, and safest, smoothest ride ever!

**ORDER TODAY or write for FREE BROCHURE.**  
State year, make & model. Pair compl. & assembled with instr. \$42.45. (Calif. residents add 4% sales tax.)

Built and backed by the one and only —

**Traction-Master Co.**



**BRAKING AND ACCELERATION WITH TRACTION-MASTERS:** Note axle housing and drive line held in stable position, wheels geared to the road for greater traction and smoother ride. Brakes apply equally. Dips, swerves and dives are eliminated and "suicide seat" is a safe place to ride!

**MONEY-BACK GUARANTEE!**

2917 W. Olympic Blvd.  
Dept. MT-4 Los Angeles 6, Calif.



car owner's



## LIBRARY

*Made in Europe* is the only magazine of its kind. Slanted especially to the businessman, it is chuck-full of export items from the far corners of Europe. It is literally a combined mail order catalog, news and travel magazine rolled into one beautifully illustrated, well-organized, and handsomely produced package.

Every month it carries features on European countries, travel tips, hundreds of new products (with suggestions about where to buy), and who's who and what's what in Europe's export world.

The 112-page January issue carried a 40-page cross-section of European cars, from the rich and luxurious to the tiny and economical. This album, produced by Boyd C. Roche, has been reprinted and is available to the readers of *MOTOR TREND* by simply dropping a card or letter to *Made In Europe*, 25 Unterlindau, Frankfurt M-4, West Germany. Annual subscriptions (including a yearly 336-page Buyer's Guide), are \$10. A special subscription rate: \$20 for three years.

• • •

Few texts in the field of industrial training can match the wide coverage of *Automotive Engines—Maintenance and Repair*. Even the most experienced mechanic will find the text and illustrations so practical and logical, that procedures considered "tricky" or "time-consuming" will appear simple and routine. Long used as a textbook for vocational and on-the-job training, it is also an excellent guide for both hobbyists and experienced mechanics.

This new, revised edition includes an up-to-date chapter on foreign engines, covering both the small economy cars and some of the higher-powered sports cars, such as the Jaguar and Mercedes-Benz. The book is published by the American Technical Society—\$5.95.

• • •

*Aston-Martin—The Story of a Sports Car*, is a rare one. It isn't often that a segment of racing history is researched and compiled with such attention to detail. It is the blow-by-blow development of the Aston-Martin firm—from its beginning in a small Kensington garage in 1913, through the long history of this classic car, to its successful 1957 season. Whether you own an Aston-Martin, or merely dream of doing so, this book will be compulsory reading for all who love fine sports cars and the history of motor racing.

A labor of love, the book was written, printed, bound and published by members of the Aston-Martin Owner's Club. It is available from Motor Racing Publications Ltd., 13 Conway St., London W1. Price—50 shillings (\$7).



Prestige · Performance · Personality

yours in the *Fury* by Plymouth



Only FURY offers you the all-important "three P's" of modern driving—in a unique blending of family car comfort and the exciting capabilities of a true competition car!

**PRESTIGE** comes naturally because, in your FURY, you are piloting neither a tough-talking "hot rod" nor an undersized "sports car," but a supreme combination of the best features of both.

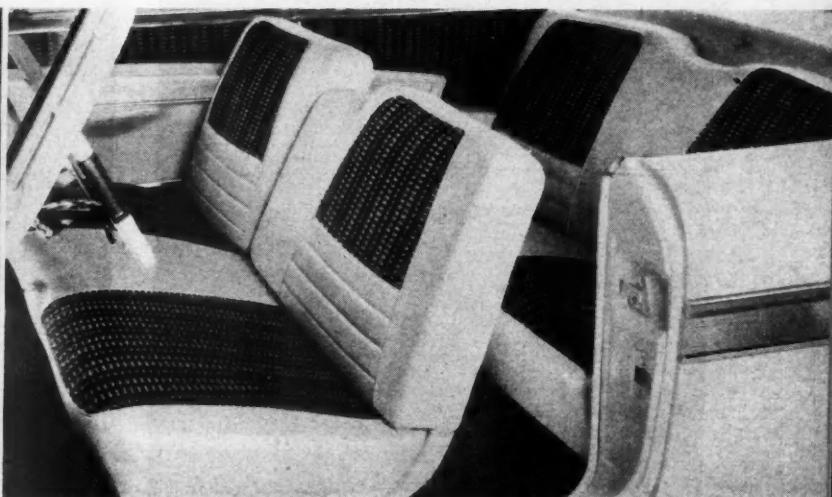
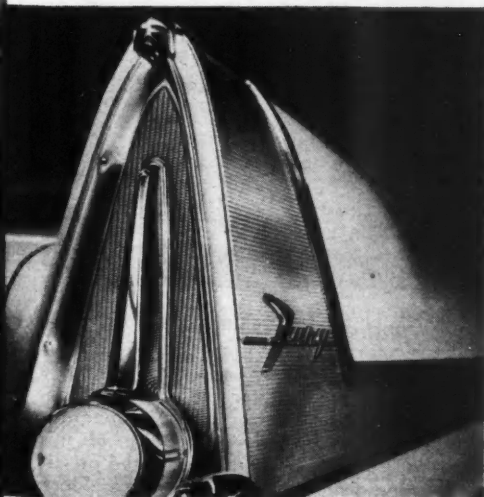
**PERFORMANCE** is assured by FURY's new *Golden Commando V-8\** engine: an utterly new design and a triumphant step forward in engineering . . . married to the

magnificent roadability of famed *Torsion-Aire* suspension. Nylon tires standard equipment. No other production model in the low-priced three has them!

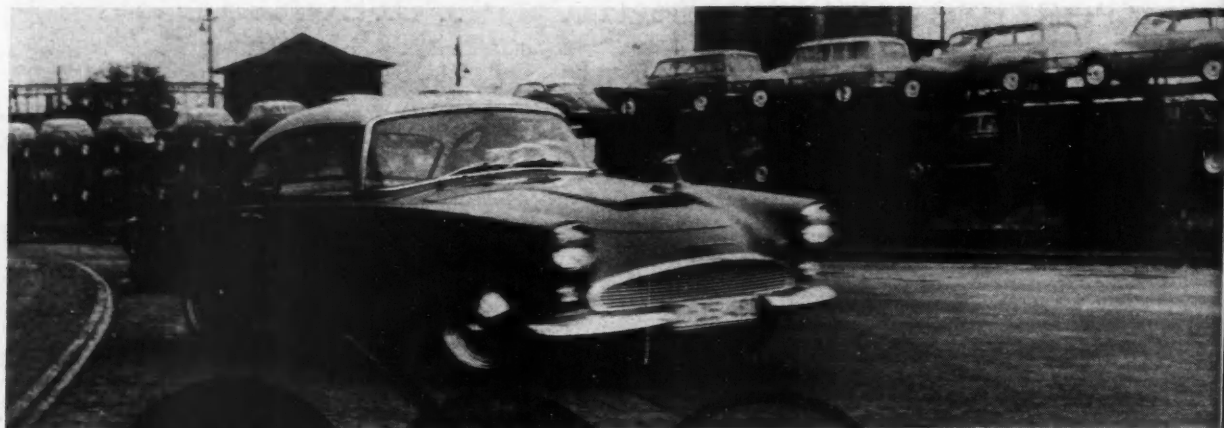
**PERSONALITY** stands out in FURY's exclusive Buckskin Beige and Gold finish . . . with tasteful interiors designed for discriminating sportsmen . . . special trim . . . and, crowning all, the FURY insignia—one of the great names in American motoring! Take *your* FURY test drive today!

*\*Optional at low extra cost*

**FOR THE MAN WHO REALLY LOVES CARS**







**driving  
around**



**with  
walt  
woron**

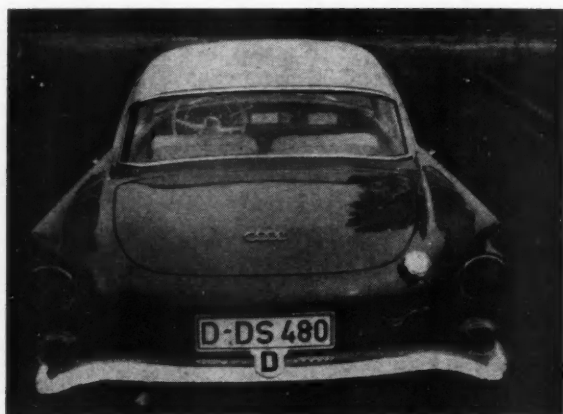
**GERM**

**IMAGINE IF YOU CAN** an automobile factory so spotlessly clean as to give you the impression of nothing being machined there. Where elaborate mechanical claws reach out to retrieve a formed part from a press they had just fed a raw sheet of steel. Where miles of continuous conveyor belts run overhead with parts varying from a basket of bolts to a complete automobile body. Where the workers, if they glance up from their bench to look at the gawking visitors, as quickly look down again. Where the few parts that are not on conveyors are transported on small trucks that scream by at speeds of 40-50 mph, even *inside* the factory. Where no formal time is taken out for lunch,

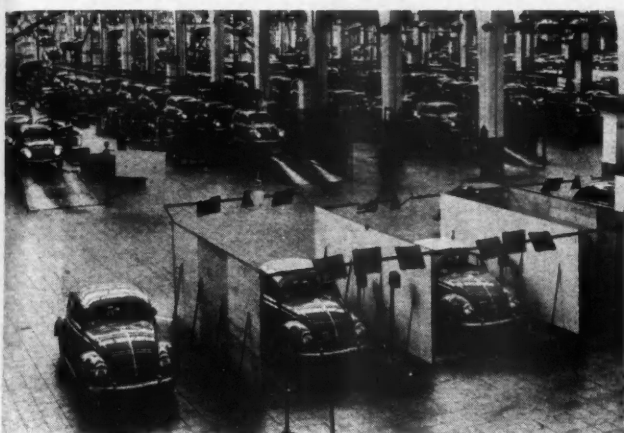
but where instead the workers reach inside their briefcases (yes, briefcases, not lunchbuckets) for a piece of cheese, a knackwurst, and a swallow of wine. Where, when you stand at one end of a corridor on the "office" side of the factory, you cannot see the other end. Where you see cars rolling off the ends of four assembly lines at the rate of one every 30 seconds.

Then, and only then, can you get the true impression of Volkswagenwerk, GMBH, located in the small town of Wolfsburg, near Hanover in Western Germany, just seven short miles from the Iron Curtain.

Much has been written about the Volkswagen factory—how



**AUTO-UNION 1000** sport coupe is reminiscent of '57 Ford Thunderbird, particularly from rear. Powerplant is three-coil three-cylinder, driving the front wheels and pushing air through the radiator behind the engine. Luggage space is adequate, interior space is generous with separate front seats. Cornering ability of this new sport coupe was convincingly demonstrated on asphalt and cobblestone ground of factory in Duesseldorf.



**DIFFERENCE** in technology is seen here in Volkswagen factory (left), where one car rolls off each 30 seconds, and at the almost stationary Porsche line (below).



# R M A N Y

## VW, DKW, Daimler-Benz and Porsche... Automation, Autobahns, Auto Union 1000

it was initially built for production of Hitler's "people's car" which no one could afford; how its ruins after the war were offered for sale as scrap by the Allied Occupation authorities and found no takers; how it came from 70 per cent ruins in 1948 to complete recovery in 1953 under Dr. (now Prof.) Heinz Nordhoff, the man placed in charge by the British Occupation authorities, to the position of the world's fourth largest producer of cars and Germany's first (472,554 in 1957); the fact that it is owned by no one, but remains "in trust" because its original owners were members of the defunct Third Reich; and how it literally built the town of Wolfsburg (with only 10,000 more inhabitants than the 40,000 VW workers).

Actually, production techniques at the Volkswagen factory are fairly conventional. Until recently, however, one method stood out in sharp contrast to others employed elsewhere. This is the paint-dip method, which still is far from universal. After the body has been welded together, it gets its soaking in two different batches of primer kept to the right consistency and temperature, is allowed to drip dry and then has applied to it several spray coats of finish enamel, with wet sandings in between. If I had my choice of working in a spray booth where any of this takes place and working in the Auto Union factory where two painters dressed as "frogmen" spray the two sides of the DKW—and everything else in sight!—well, the choice should be obvious.

**WHERE THE HIGH POINT** of our visit to the Volkswagen factory was the assembly of cars, the high point of our visit to the Auto Union works in Duesseldorf was a chance to ride in two cars we hadn't seen until that time: the DKW version of the jeep, and the hit of the Frankfurt Show, the Auto Union 1000 sport coupe.

To lessen the confusion between the use of the two names of DKW and Auto Union, it might be pertinent to mention that Auto Union before the war was a group that made DKW, Audi, Horch, and Wanderer cars. When the war ended, it lost all its factories in the Eastern Zone. The new Auto Union factory in Duesseldorf now builds the DKW and will shortly re-activate the name of Auto Union in its sport coupe.

The ride in the DKW jeep was a rough-and-tumble affair that started off smoothly enough on the streets around the factory,

but the minute we entered the hilly woods outside of town we embarked on a rollercoaster ride: down hills so steep that we had to brace ourselves against the back of the front seats to keep from flying over the flat windshield, then up hills that made you feel you were lying on your back. Minutes later we entered an area long pock-marked by shell holes from six to 12 feet across and several feet deep. The previous night's rain had made the normally slick grass as slippery as a marble slab, but this didn't faze our driver. Down into the holes we went and up we came. Spinning circles on the slick slopes seemed to be his passion, with the jeep always in four-wheel drive, of course. How it maintained traction at all was amazing.

The Auto Union 1000 sport coupe was first demonstrated to us by a former Auto Union race driver, Herr Metz. With only 56 horses at its disposal, it gets to 40 mph in second, 70 in third, and should do 88 to 90 in top. Roadholding is superb, and surprising, if you're not acquainted with front-wheel drive. Metz would get it going as fast as he could in the short distance available within the factory grounds—on cobblestones—start turning hard into a sharp corner, allow the rear end to break loose, then downshift, apply more throttle, and completely reverse our direction. With its comfortably shaped seats, generous room, good finish, and looks reminiscent of the '57 T-Bird, it should find a ready market. When it starts rolling off the line in the spring it will be accompanied by a roadster, both priced near the \$3000 mark.

**LATER, AT THE PORSCHE FACTORY** in Stuttgart, we mentioned the DKW jeep ride, and within minutes we were on our way to another jeep demonstration. Oh no, not another! we thought. This one, too, had four-wheel drive but naturally had the air-cooled engine in the rear instead of the front. It was an impressive demonstration of hill-climbing ability, yet somehow we came away with the feeling that the West German Army's purchase of 2000 DKW jeeps was more than happenstance.

In Ferry Porsche's office, we had the opportunity to ask a few questions that had been bothering us. The possibility of higher production than the 5158 cars produced in '57 was one of them. This, Herr Porsche explained, is directly related to the number of bodies that Reuters (the body-builders next door) can build. "If they could build more, we could build more." As

continued  
61



**EXHAUST CUT-OUT**  
Fits any exhaust pipe, any car. Dash control kit is included.

**SEND \$2.95**  
Postpaid

**10<sup>th</sup> ANNIVERSARY 1948-1958**  
TEN HONEST YEARS OF SPEEDY PROGRESS

**CHARLEY SPEED SHOP**  
10000 Highway 100, Box 1004  
Chattanooga, Tenn., USA  
Taylor 1-75-33 Special to Speedy

**1948 1958**  
**\$1.00 FREE**  
CERTIFICATE OF APPRECIATION  
**SURPRISE MONEY SAVER CATALOG**

SEND 25c FOR NEW 1958 SURPRISE MONEY SAVER CATALOG—THEN NEXT ISSUE FREE

**HONEST CHARLEY SPEED SHOP**  
Box MT 1904  
Chattanooga, Tenn.

**T-BIRD OWNERS**

Auto Top Lift removes & stores your hardtop. Now \$9.95 ppd. Instrument panel, padded storage pocket, many Bird items. Write for illus. brochures. MT-4.

**JAMES AUTO SPECIALTIES**  
Box 151, Pasadena, Calif.

**MAKE MORE MONEY IN AUTO MECHANICS AND DIESEL**

You are needed in auto garages, airplane factories, farm shops, experimental cars, engines, and labs, wherever cars, engines, and trucks are repaired and serviced. Training prepares you at home, in spare time, for these fascinating opportunities. You get everything you need, including lessons, diagrams, manuals, consultation privileges, graduate employment service. Low Tuition; earn as you learn.

**YOU GET AND KEEP ALL THIS EQUIPMENT**

**NATIONAL SCHOOLS**  
LOS ANGELES 37, CALIFORNIA

**NATIONAL SCHOOLS, DEPT. # DW-48**  
4000 S. FIGUEROA ST., LOS ANGELES 37, CALIF.

Rush free Auto Diesel "Opportunity" Book and sample lesson. No salesman will call.

NAME \_\_\_\_\_ AGE \_\_\_\_\_  
ADDRESS \_\_\_\_\_  
CITY \_\_\_\_\_ ZONE \_\_\_\_\_ STATE \_\_\_\_\_

☐ Check if interested ONLY in Resident Training at Los Angeles. VETERANS: Give date of Discharge



**Driving Around continued**

to future developments, "These are going along constantly, though there is no plan to change the original concept of the Porsche from what it now is." When we asked him more specifically about the Porsche racing engine with the Fletcher-designed jet exhaust principle ("Motor Sports," Mar. '58 MT) that uses heat from the exhaust to give additional power, Herr Porsche exchanged glances with the other technical people present who were evidently more interested in racing than he, then replied, "The problem of silencing this system makes its use on a passenger

four and six. This information is then recorded against the future time when a customer may need a replacement part. It's then a cinch to provide another part that will keep everything in balance.

When we bade goodbye to the Daimler-Benz factory, we didn't leave empty-handed—that is, the publisher didn't anyway. What better method of transportation at such a time than driving away in your own Mercedes-Benz 300-SL roadster? And what better way of becoming acquainted with the German countryside? While the publisher took off for Munich, we



**RIDE IN DKW jeep was rough-and-tumble affair, in and out of shell craters.**

car impractical. We'll use it on race cars."

In Stuttgart, the German version of Detroit, we had a chance to compare small production with Germany's third largest producer of cars and trucks. Where Porsche assembles cars on a modified version of an assembly line (actually more along the lines of an aircraft factory) and has its bodies built elsewhere and buys some engine parts from Volkswagen, Daimler-Benz is strictly a production-line works that produces everything but the raw metal and some castings in its own factory.

Engine assembly is a good point of comparison, too. At Daimler-Benz, the 190 and 220 engines move along on two constantly running lines, while the 300-S and 300-SL engines are on stationary lines where two mechanics handle complete assembly of one engine from beginning to end. At Porsche, the engines move on a circular line where mechanics (many of them women) perform their individual jobs. In both cases, all rods and pistons are weighed as units and matched in sets of

(Günther Molter, our European sports correspondent, and I) drove to Heidelberg in a Mercedes-Benz 220 from the factory.

Near Heidelberg we took several slow laps around the not-often-used Hockenheim circuit, a 4.8-mile egg-shaped course with only one sharp left at the narrow end. Except around that one corner the terminal velocities reached by race cars can be fantastic. Molter previously took a 300-SL roadster down through the tree-flanked roadway at a speed of 135 mph. And the last time the motorbikes used the course, the Italian Gilera's averaged 125 mph.

Driving on the Autobahns of Germany is pretty much like driving on our own turnpikes except for the type of cars you see and the road signs. Except where bridges were bombed out and have never been replaced in original condition, the roads are two lanes on each side, with entries, exits, and other instructions plainly marked by universally-used (throughout Europe), easy-to-decipher



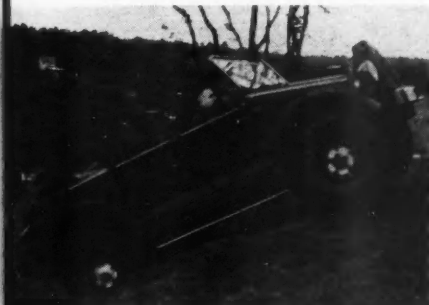
road signs. When you travel fast you stay in the left lane. Though I had been warned that slower drivers refused to move over, a quick blinking of my headlights with the passing signal never failed to work.

Considering that the Autobahns were started in 1933 and that 1350 miles had been built by 1939, if the original plans had been carried out, Germany could have had the most modern road network in the world today. However, in another 10 years West Germany hopes not only to have repaired and enlarged their present 80,000 miles of classified roads, but also to have doubled the Autobahns.

Throughout the parts of Germany we traveled, the predominant car was the Volkswagen, followed by Opel, then by Mercedes. Registration-wise, of the 2.3 million cars in Germany, VW is tops with 818,000, Opel second with 443,000, while Lloyd is third. The age of the cars appeared to be anywhere from brand-new to six years of age; this apparently ties in with the Federal Road Traffic Office's estimate that half of the registered cars were produced during the past three years. In the hands of G.I.s we saw cars much older than this, and more American cars than we saw in all the rest of Europe.

When you consider the fact that Germany lost two wars, 8.5 million men, and saw 85 per cent of its industry dismantled after this last one, the recovery they have made seems fantastic. Two-thirds of pre-war Germany's industrial production was accounted for in present-day Western Germany. It seems fairly logical to assume that all production will continue to increase at a fairly rapid pace; automotively, production has nearly doubled in the past two years.

Of course, no story of Germany would be complete without mentioning its beer



PORSCHE jeep leaps over hill crest.

halls, its songs, and its rich food. I'd like to tell you about the good jazz I heard at the Rocky Roller (!) in Duesseldorf, the visits through the castles of Schwetzingen and Heidelberg, the feeling of camaraderie I got with all the Germans I met through their habit of never failing to shake hands at every meeting and departure, their love of good food and "guten appetit," and as many different and delectable beers as you've a capacity for—but that's all part of another story. /MT



## British receive key to city

Representatives of the new 1958 Triumph Sedan accept honor. "Our new Triumph Sedan is getting a rousing reception wherever it appears. In all modesty, we feel this is a tribute to its exceptional features." ■ Knock-down seats that give 30 cu. ft. of storage space. ■ Tubeless tires, directional signals, and ash trays are all standard equipment.

■ TR 3 sports car motor engineering gives speed up to 78 m.p.h.

■ Economical operation with 40 miles per gal. ■ Also see the new 1958 Triumph Estate Wagon, only \$1899\*

\*Slightly higher on West Coast...white walls extra.

# TRIUMPH

SEDAN ONLY  
\$1699\*

Standard-Triumph Motor Company, (Dept. DS4) 1745 Broadway New York 19

\*plus tax and license at U.S. ports of entry



## MAGNETIC DRAIN PLUGS CAPTURE

# Wild Metal\*



Don't let harmful metal filings cause unnecessary engine wear. Replace ordinary drain plugs in your car, truck or bus with MAGNETIC DRAIN PLUGS. The powerful magnet contained in plug attracts and holds harmful metal particles present in the oil. If allowed to continue in free circulation, these "wild metal" particles cause engine wear and major damage to cylinder walls, bearings, gears and other moving parts. For maximum efficiency, the MAGNETIC DRAIN PLUGS should be cleaned after each oil change. Now available for all cars including 1958 models.

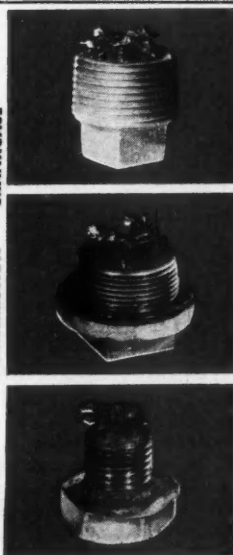
Set of  
3 plugs  
**\$4.95**



\*"Wild metal" is the accumulation of iron and steel particles that circulate throughout the crankcase oil.

CLIP OUT AND MAIL HANDY COUPON BELOW

CRANKCASE  
TRANSMISSION  
DIFFERENTIAL



## ENOCH AUTOMOTIVE ACCESSORIES MT-4

8730 Long Beach Blvd., South Gate, California—Phone LOrain 7-2121

Please ship set of 3 MAGNETIC DRAIN PLUGS guaranteed to last the life of my car at \$4.95. Factory pays shipping to my door. (Sorry, no C.O.D.'s)

NAME \_\_\_\_\_

ADDRESS \_\_\_\_\_

CITY \_\_\_\_\_

STATE \_\_\_\_\_

Make of car \_\_\_\_\_

Year \_\_\_\_\_

Transmission (check one):

☐ Standard ☐ Auto.



## Motor sports



IN PASSING TEST Cad tows white puck (out of photo) on cable. Ford followed close, cut out, then back when clear.

# PUBLIC PROVING GROUND

by William Carroll

**This idea could become commonplace across the U.S.  
if NASCAR's driving skill test program gains support**

**T**OP SECRET has long been a mild classification of secrecy around Detroit's proving grounds when it comes to discussing results of comparative car test programs.

Now, if NASCAR has its way, you can not only test your car and driving skill, but read about identical tests of every American car. Whether the manufacturers like it or not, comparison tests in the handling and brake department will soon be public news.

This project has been office conversation for a number of years in racing circles. When, in 1957, the Automobile Manufacturers Association "recommended" that factories no longer participate or advertise speed in performance records, something new was needed for car makers to hang their advertising claims around. NASCAR's "Traffic Passing Test" and "Stop and Go Test" are designed to be that advertising hook.

A fire was first lit under the boiler by Dick Dolan, Special Activities Director for the Pure Oil Co., co-sponsors of Daytona's famous Speedweeks. Dick wrote automotive editors and writers all over the country asking for suggestions on car testing. From these suggestions and his experience at Daytona, Dick paper-planned a test program that seemed to

make sense. In the meantime NASCAR prexy Bill France alerted the Florida Highway Patrol to the new plans. The Patrol assigned Captain C. W. Keith, Chief Driver's License Examiner, to go to Daytona and assist with the project. By the time Dolan hit Daytona late last year, a NASCAR crew and Captain Keith had already found an abandoned airport for the experimental layouts. Here they assembled a motley collection of rented Cadillacs, Edsels, Chevrolets and Fords to represent the average American car.

At first they tried to use a replica city block, with rubber traffic control cones marking curbs and corners for a "Stop and Go Test." It was soon discovered that a full city block took up too much of the airport, and Bill France suggested they unwind the block along one edge of the runway, leaving the other edge for a "Traffic Passing Test." Five days and thousands of miles later (off the tires) they had perfected the most interesting car and driver test it's ever been our pleasure to drive. Problems met and solved included: How high should flags stand to be easily seen from car windows? Are foot-wide white lines broad enough to stop on every time? How much space does it take to stop a car backing at full throttle? Should speed limit and

road condition signs be used? (They ended up using only "Stop" signs—thank goodness.) And happily for NASCAR the new tests can be run almost anywhere. Even on unused race tracks after the addition of two tiny parking pads.

Scoring proved a major headache. It could be juggled to test the driver—or test the car. Dick spent many a sleepless night with his baby until finally a scoring procedure was created that was fair to both car and driver, and could be modified to test one or the other (car or driver), or both.

When the first tests opened for public use during the 1958 Daytona Speedweeks, the location was unused Flagler Airport left over from the last world war. Here a large house trailer served as registration point, with many a \$20 NASCAR membership fee and \$2 insurance charge collected by the Steward's clerks. Then numbers were painted on each entered car and the gas tank drained and refilled with Pure gasoline so each contestant ran with the same fuel. About a mile from the tank trucks was the Start-Finish line of the "Stop and Go Test" where cars lined up to discover what most of us already know: Brakes are lousy and clutches only a little better.

Running the "Stop and Go Test" is

fun, but is rough on cars. You're flagged away by the starter and your time taken by a photo-electric eye. Just ahead on the end of a 200-yard straightaway is a genuine "Stop" sign. Slam on the brakes and try to stop with front wheels on a one-foot wide white line. Turn right. Stop. Back across the painted traffic lanes. Stop. Start forward into the lanes and turn left to scream up another 200-yard straightaway to a second stop sign. Repeat the turn and back-up procedure, then head for the third of six stop-signed intersections. The full course has four complete intersections with a turn-around and stop area at each end, making a total of six "Stop and Go" areas. You and the car buck and dodge through intersections no less than 20 times in a run, which is supposed to be completed in six minutes and 20 seconds. Impossible? Sure. But by shooting for the lowest possible time you really use the "Go" pedal and brake for all their worth.

In contrast the "Traffic Passing Test" is run at speeds of 30 and 50 miles an hour. Ahead is a tow car dragging a carefully painted white tire with a round board center nailed to one sidewall. It scoots along somewhat like a giant white hockey puck. Up from the center of the board and tire puck is a four-foot wooden rod with a red flag. The idea? It's simple. Just follow the flag as closely as you can. When you pass a certain white line on the pavement, floor the throttle and see how quickly you can pass and cut in front of the tow car. No problems with fenders either. Some genius took a cap off the tire-towing Caddy's dagmars and stuck a 25-foot bamboo fishpole in the resulting hole. A red flag on the end of the fishpole represents the fender of the car you are passing, though if you hit it no more damage is done than a terrific loss of points. Scoring was made easy by a yardstick painted on the pavement. Observers note where the left rear wheel of your car crossed the yardstick while pulling back in front of the passed car. Three passes and you're out, with the total score being an average of the three tries.

How did we do? Not too good. Not too bad. First time on the "Stop and Go Test" we ended with 351 points (the winner had 744) and a time of 7 minutes 58 seconds (the winner's time was 7 minutes 11 seconds). This horrible score was made while driving MOTOR TREND'S DeSoto Adventurer, with all 345 horsepower being used to make the most spectacular dry pavement spin-out of the entire four-day event. The next day our DeSoto's score was bashed by a trip made in a little white Volvo. This time we came up with 437 points in an elapsed time of 7 minutes 27 seconds. A second run in the Volvo, two days later, turned up the top score (for us that is) of 552 points with a time factor of 7 minutes 42 seconds.

What it all proves is not hard to decide, once you've driven or watched an event or two. Many a car ended the "Stop and Go Test" with brakes smoking like burnt toast, and smelling twice as bad. Clutches were gone on the "shift-yourselfers" and several power steering belts fairly shrieked for attention after a go at the severe cornering. In fairness to Detroit, it should be pointed out that while such problems were consistent with those cars with weak brakes, clutches or steering setups, more careful drivers ran the tests with much less damage than did leadfoots and slide-em-home boys. In case you're interested, DeSoto brakes passed the test with only light fading which could not be considered a safety hazard. Nothing else on the car acted up, and it handled like the powered steering dream that it is. Nor did the little Volvo turn a hair. Brakes and clutch showed no after affects of a test so severe that more than one American AND imported car eased to the nearest garage for a new set of brakes or clutch overhaul.

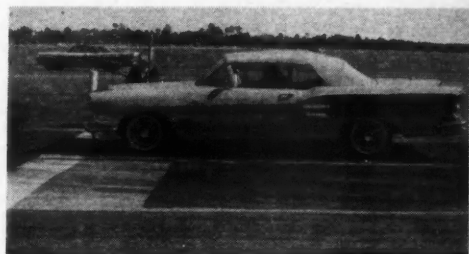
What's wrong with the new tests is obvious. For one thing, as set up now the events are designed to test cars, with a premium on elapsed time forcing drivers to push their iron to the utmost. Many entrants would have enjoyed the test more, but fought shy of an all-out effort to save brakes and transmission. NASCAR's boss, Bill France, tells us the scoring will be modified for driver training with elapsed time less a factor—and driver skill more important in attaining a top score. Another problem was length of the "Stop and Go Test." Many drivers felt that running through 10 intersections (instead of the present 20) would separate men from the boys, then in a final play-off a full 20 intersections could be run to determine winners. The "Traffic Passing Test" suffered from fewer criticisms. At least everyone entered this event; only about half entered the "Stop and Go."

Where NASCAR expects to take the project is no secret. Most race tracks (auto that is) stand idle 340 days of the year. They could profitably be put to use testing cars, providing driver training, or cooperating with local law enforcement officials in establishing a uniform driving test to be used throughout the nation. Of course Detroit might pick up the ball and use test results to advertise winning products. Though factory drivers could end up winning most events, NASCAR rules cancel out modifications, with the result that winning cars would be honest stock cars you could buy from your dealer. This, of course, is not the case today in the cars used for "stock" car racing.

Whether the new tests amount to much, or are just another game for big boys (and their wheels), was answered during an interview with Lt. Col. Reid Clifton, Deputy Director of the Florida Highway Patrol. Colonel Clifton had just completed driving a Rambler through the "Stop and



**IN PASSING TEST**, target was towed to mark point for starting a pass.



**STOPS AT INTERSECTIONS** had to be made with wheels on white line.



**RIGHT AND LEFT TURNS** plus back-ups, were made 20 times during the run.



**WINDING UP** in "Stop and Go Test" contestant must stop on white line.

Go Test" and was still sparkling with the excitement of competition when we asked him for an opinion of NASCAR's new program.

"I think," replied the Colonel, "that more of these courses should be set up, with proper supervision, to give everyone a chance to test themselves and their car."

**AS WE WENT TO PRESS** with this issue of MT, Daytona Speedweeks was still in progress. Bill Carroll, covering the event for this year, wired the following:

**Dateline Daytona:** Battle of Beach this year was an alley fight compared to 1957's riot of factory cars swarming over sands like king crabs. 1958 found fewer cars, with competitive spirit between friendly individuals rather than war between corporations. Here are most important results:

**First Event**—2-way flying mile by 3 prestige cars. Norman Burgess, Miami, Fla., averaged 112.888 in Lincoln Continental. Also ran were Imperial (111.930) and Cad Eldorado (104.895).

**Experimental Cars**—Karol Miller, Houston, Tex., flew flying mile with 2-way average of 153.061 in much-modified, full-house '56 Ford hardtop. Next were '58 Pontiac (135.440), '57 Pontiac (131.868), '57 Olds (123.967), '57 Corvette (122.825). These ran all types of speed equipment.

**Sports Cars**—2-way record runs. Peter MacDonald of Detroit nabbed modified trophy with average of 149.068 in blown T-Bird, which later blew at 6000 rpm. '57 Jag hit 111.111 for C production, '58 Austin-Healey 103.583 for D production, '58 Alfa Romeo 98.280 for G production, '58 Fiat-Abarth

750 averaged 75.094 for H production, '58 Corvette 135.440 for B production. Top European sedan under 1500cc was Sunbeam Rapier at 73.439. Sedans over 1500cc taken by '58 Jag 3.4 at 112.888.

**Acceleration runs for sports cars** found '55 T-Bird topping Class A at 90.498. Class B (fastest of day) was Chevy-powered '49 Veritas roadster at 95.847. Class C was '58 Corvette at 86.831, Class E was '56 Triumph at 67.664, Class F was MG-A at 70.258, Class C Modified was '56 Corvette at 90.361, and Class E Modified was '57 Triumph at 73.801.

**Acceleration runs for European sedans** under 1500cc found '57 Sunbeam Rapier averaging 58.821. In over 1500cc, '58 Jag 3.4 did 70.893.

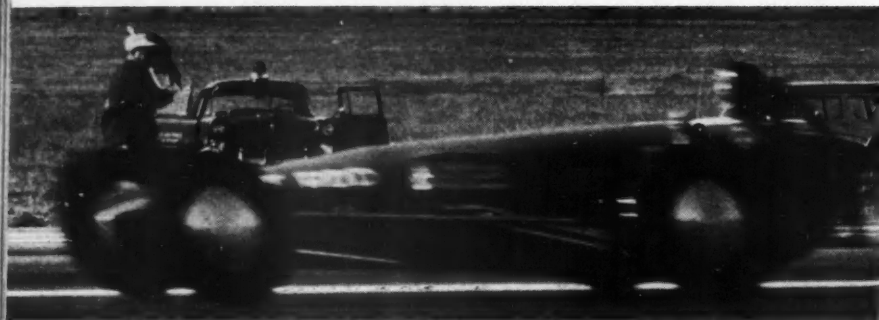
**Big 3 Championship** had only Ford, Chevy and Plymouth entered. Must run single carb, automatic transmission, and use no special cams or optional equipment. Event won by '58 Chevy at 2-way average of 116.599. Fords averaged 116.129 to 109.107. Lone Plymouth hit 101.509.

**Official Nascar 2-way runs for standard production cars with optional speed equipment** broke only one record but many hearts. Class 3 taken by '58 Rambler American at 88.160; old record from '54 was 86.895. Class 4 taken by '58 Rambler at 100.348. Class 5 was all '58 Chevys, with top one doing 131.004. Class 6 was Chevys, Plymouths, lone Merc. Fastest was '58 Chevy at 126.249. Chevy won 7 of first 10 spots, Plymouth other 3. Merc was last at 100.362. Class 7 cleaned by '58 Pontiac at 137.693. In fastest 10 cars, 8 were '58 Pontiacs (1 to 6, 9, 10) and others Chrysler 300-Ds. Slowest car of first 10 was 123.056. First 5

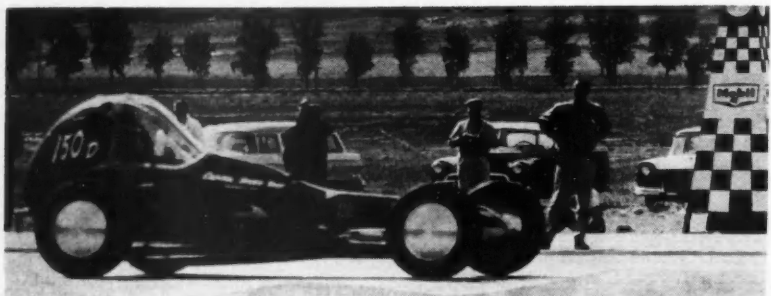
Pontiacs ran from 137.693 to 134.329. Why? See my story on engine (page 11, Ed.).

**Most fun for man off street** was Century Club runs, which offer certificate of speed for cars faster than 100 mph. Anything can, and does, run. Some in good shape, others should've stayed home. Averages of 313 runs of cars that ran, by make, are interesting: Buick One '58 turned 120.48, eight '57s averaged 124.25 with top being 134.52. Cadillac One '58 Eldorado did 104.89, two '56s avg'd 101.65 with top of 103.80. Chevy 24 '58s avg'd 121.05 with top of 130.34, eleven '57s avg'd 110.00 with top of 138.62. Chrysler Ten 300-Ds avg'd 130.90 with top of 141.06. Four '58 New Yorkers avg'd 119.00, Imperial did 111.93, four '57 300-Cs avg'd 122.00 and top of 125.52. Corvette Five '58s avg'd 121.40 with top of 139.24, five '57s avg'd 116.00 with top of 117.53. DeSoto Four '58s avg'd 122.32, with top of 125.91, four '57s avg'd 114.75, with top of 117.64. Dodge Five '57s avg'd 111.00 with top of 127.97. Edsel One did 114.21. Ford Five '58s avg'd 105.60 with top of 118.81. Thirteen '57s avg'd 117.15 with top of 137.61 for much-modified sedan. Lincoln Continental avg'd 112.88, two '57s avg'd 110.50 with top of 112.71. Merc Four '58s avg'd 118.25 with top of 121.99, four '57s avg'd 119.38 with top of 123.28. Olds Eight '58s avg'd 119.22 with top of 134.83, eleven '57s avg'd 120.00 with top of 141.84. Pontiac Thirty '58s avg'd 123.26 with top of 141.84, two '57s avg'd 132.00 with top of 134.22. Plymouth Seven '58s avg'd 115.00 with top of 128.02. T-Bird '58 avg'd 108.50 with top of 110.10, three somewhat-stock '57s avg'd 115.70 with top of 121.74, much-modified T-Bird peaked at 147.17.

## DRAGSTERS CRACK WORLD STANDING-START RECORDS



CAL RICE averaged over 123 mph from standing start in new kilometer record.



**SHATTERING MARKS** of 20 years' standing, two new world's records for the standing start kilometer in Class "B" and "C" have been submitted to the F.I.A. for approval.

Under the sanction of the United States Auto Club, Calvin Rice in a Chrysler-powered dragster covered the distance in 18.1045 seconds for an average speed of 123.556 mph at March Field, Riverside, Calif. on February 2. This shattered the old Class "B" record of 117.3 mph set in 1937 by Bernd Rosemeyer in an Auto Union on the Reich-autobahn.

On the same day, Ed Cortopassi broke the Class "C" record in his Glass Slipper Special. His time for the standing kilometer in this Chevrolet-powered dragster was 19.213 seconds for an average speed of 116.428 mph. The old record was also held by Rosemeyer at 105.5 in another Auto Union.

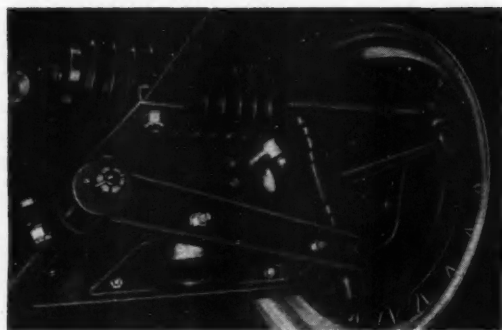
Rice and Cortopassi along with the crews which prepared the cars are to be congratulated for this magnificent effort. Working with limited funds, they have been able to bring records to the U.S. which were previously established with the backing of the entire resources of Hitler's prestige-hungry government.

**ED CORTOPASSI** in Glass Slipper Special sets new world mark in sleek dragster powered with Chev engine.

continued on page 82







The secret behind the superb roadability of the MGA lies in a specially developed system of independent front wheel suspension by coil springs and wishbone-type linkage.

Ask your dealer to tell you about the surprisingly modest cost of an MGA.

Represented in the United States by

**hambro** AUTOMOTIVE CORPORATION • 27 West 57th Street, New York 19, New York  
A product of The British Motor Corporation, Ltd. • Sold and serviced by a nationwide network of distributors and dealers.

Complete MGA specifications are available upon request.

## What's in a (trade) name?

Are you confused by the jumble of tire trade names, unable to distinguish between the many quality grades? Here's how the Federal Trade Commission is coming to your rescue.

by William Carroll



**GHOSTS ARE SUPPOSED** to be frightened by burning rubber—which is reason enough for smoke clouds over Akron, home of the automobile tire. While government investigators are digging deeply into tire advertising practices which have been so confusing, tire makers are sending up smoke screens to quiet the body in their closet.

The spook watch began November 22, 1957, when the Federal Trade Commission issued a four-page booklet entitled **Proposed Tire Advertising Guides**. Discussed in the guide (and obvious cause for its publication) are such subjects as Standards of Construction, Original Equipment, Plies, Changeovers, Disclosures That Tires Are Obsolete or Discontinued Models, Prices, Guarantees, Blemished Tires, and Safety or Performance Features.

In commenting on Standards of Construction the F.T.C. guide states in part that in advertising tires no grade designations should be used which directly or indirectly represent such products to be of a grade or quality that has not been established or recognized, and that no tire should be called First-Line unless it is of no lower quality than tires currently in general use as original equipment on new automobiles.

**WE WROTE TO 14** major tire producers and asked, "What brand names are applied to tires of your manufacture, and how are these brands classified as to quality?" Most concerns did not reply. A few wrote as did one large company, "... The information you request is considered classified by our company. In order to give you the complete picture ... in true relationship to tire quality, we would have to reveal tire compound formulas." In other words, the writer of the letter believes it's none of our business as to which of his concern's tires is their best and which are second and third quality.

Dayton, Firestone, Goodrich and Seiberling did reply and told us much about their tire line, tread depth and quality designations, which we have charted for your information. But as to the other companies it's no wonder 3000 members of the National Tire Dealers and Retreaders

Association petitioned the rubber manufacturers to "establish a clear and meaningful terminology for the designation of comparative tire qualities." For, as one tire dealer told us, "There are 31 different types of 6.70 x 15 tires on the market today, made by a single factory, ranging in list price (you can buy them for less) from \$15.65 to nearly \$60. Not only are motorists confused, but tire dealers are going broke trying to maintain a representative stock."

**ANOTHER PROBLEM DISCUSSED** by the F.T.C. under Standards of Construction is that of brand names. For example: Firestone manufactures a Deluxe Champion and a Deluxe Super Champion. The factory will honestly tell you the Super Champion is "second-line in price," but sharp tire dealers will assure you the Super tire is better than the other, though its maximum load capacity is 165 pounds less. Other makers use almost identical trade names on both Premium and First-Line tires, while competitors carry a single trade name through all their line with a not too obvious secondary designation to indicate quality relationship of the tires.

Often tires are referred to in such terms as "100 Level." About this the F.T.C. guide says, "... terms of similar import should not be used in any tire advertisements unless in immediate conjunction with the terms there is a clear and adequate disclosure of the actual meaning of the term ..."

**WHY A GOVERNMENT AGENCY** is interested in such tire quality comparisons is clarified by a statement from the Kiplinger magazine **Changing Times**: "These terms (100 Level, etc.) refer primarily to price and only indirectly to quality ... a company's 200 Level tire would be twice as costly ... its 90 Level tire would be 10 per cent cheaper than its first-line (100 Level) tire."

Further support for contentions that the term "Level" has little to do with actual tire quality came in a recent letter from The Tire and Rim Association, an organization of nearly all tire and wheel makers. Wrote the association, "The tread depths of new tires are decided upon by the individual tire manufacturers."

Laboratory tests by the industry's largest independent tire testing organization (V. L. Smithers Laboratories, Akron, Ohio) show, "The non-skid depth of most four-ply passenger tires is approximately 0.33-inch. The depth of six-ply tires is slightly greater." Perhaps the clincher to the whole confused dish of tire tread quality was P.S.'d to a letter from the Seiberling people: "As for depth 'ratings,' no such animal exists."

F.T.C. comments on Original Equipment tires pointed out that such a label is understood by the public to mean tires of the brand and quality used on new current model automobiles. Said the Commission, "A tire which was formerly, but is not currently, used as Original Equipment should not be described as Original Equipment without clear and conspicuous

continued

### EXAMPLES OF TRADE NAMES USED TO CLASSIFY TIRES BY GRADES

Maker	Premium	First-Line	Second-Line
Seiberling	Sealed-Aire	Safety	Super Service
Dayton	Blue Ribbon Premium Thorobred	Thorobred	Flyer
Goodrich	Life-Saver Silvertown 125 Trailmaker	Deluxe Silvertown	Goodrich Deluxe
Firestone	Supreme 500	Deluxe Champion	Deluxe Super Champion



## What's in a Trade Name?

continued

disclosure of the latest year such tire was actually used as Original Equipment on new cars."

**WE WERE INTERESTED** to discover that the term "Ply Rating" as used in the tire business is a measurement of tire strength—and does not necessarily represent the number of cord plies in the tire. Says the F.T.C., "To avoid deception, such terms as 'Six-Ply Rating,' as descriptive of tires containing fewer than six plies, should be accompanied by a conspicuous disclosure of the actual number of plies in the tires so described." To amplify this portion of the guide, the Smithers Laboratories tells us that no passenger car tires are made in the United States with less than four actual plies. However, premium tires or extra-ply-rated tires occasionally use higher strength cord, in which case the four plies plus one or two breaker strips may be called a "six-ply rating" tire. For in the tire trade, ply ratings usually indicate load-carrying capacity and bruise resistance of the carcass.

On the subject of prices the F.T.C. guide was more to the point. "Advertised prices of tires should be the bonafide actual selling price which purchasers pay for the advertised tires . . . Use of manufacturer's list prices which are not the actual prices at which the particular tires are usually and regularly sold are (deceptive) within the meaning of this guide."

Other price abuses listed by the F.T.C.:

1. A specific tire offered for sale at an advertised price, when such a tire is not really available and the customer will be "switched" to a tire of different grade, brand or quality.
2. Reductions from regular prices given the purchaser of tires, when the reduction is not merited because a required trade-in has not been made.
3. Tires offered at "1/2 Price" or "50 Per Cent Off" when the motorist is required to buy one tire at the regular price to get a second tire at one-half regular price, even though terms of the offer are hidden elsewhere in the advertisement.
4. So-called "Reductions in Tire Prices" when the reductions are from a fictitious price list; or when the so-called "Special Sale Price" is the same price at which such tires customarily were sold for some time preceding the advertisement.

Frequently eager tire dealers will advertise "Blemished" or "Imperfect" tires at a substantial discount from regular prices. In such sales, the F.T.C. suggests that advertisers disclose exactly why the tires have been discounted. In addition, such tires should have permanently stamped or molded markings, or the wrappings in which they are encased should have a plain and conspicuous legend or statement to the effect that such tires are blemished, imperfect or obsolete, or stating the reason why they are defective. Marking by "XX," with a color patch or other code designation not generally understood by the public is considered to be an inadequate warning to the buyer.

**HOW IMPORTANT PROPER SIZE** and quality of tires become when you buy a

new set is revealed by figuring new tires for a current car. A 1958 Buick Special sedan weighs about 4450 pounds ready for the road. This total weight divided by four puts 1112 pounds on each of the four 7.10 x 15 tires, which are rated by the Tire and Rim Association to carry 1090 pounds at 24 pounds of air. (By the way, that 1090 pounds is the **maximum** load weight recommended by the Association for this size tire; so to begin with, the Buick tires are slightly overloaded.) Then, when the car owner replaces his worn first-line rubber with second-line, which is rated about 1000 pounds per tire, he is overloading his four tires by a total of 450 pounds. This basic overload, plus stresses of four passengers instead of one, fast driving, or even a little low pressure could result in either a blowout or very rapid wear.

As one tire distributor who sells about \$20,000 worth of tires a month said, "There are a lot of Cadillac owners in town who are going to be mighty unhappy when the second-line replacement tires on their car last only 10,000 or 15,000 miles. But they bought them on price, became confused by brand name switches instead of buying tires for quality and safety."

Now that the Federal Trade Commission is interested in the tire business it may be possible for us to decide between a Motor Chief, Super Chief and a Deluxe Chief; whether a Pacific Cushion is better than a Pacific Deluxe; or why an Advanced Double Life and a plain Double Life are both rated as Premium tires. At the present time most of us are so confused by such tricky brand names that anything fitting both car and pocketbook seems good enough. In short, on the present tire market, it's pretty hard to tell a good tire from a damp doughnut.

**T**RAFFIC ACCIDENT surveys would seem to indicate that the problem driver—the traffic neurotic—is much more dangerous than the drunken driver. Emotional instability, evidenced by hostility, frustration and aggression, can produce accident-prone motorists. The nervous driver is unable to remain calm under the stress of an emergency and lacks presence of mind when it is required. He loses his temper easily—and with it, his judgment.

Here are five rules to help keep your nerves steady while driving:

1. Watch out for the emotionally upset driver. He's the one who weaves in and out, jumps red lights, passes you too closely or won't let you pass him. Keep out of his way. You may be "right" according to traffic rules, but he's the dangerous one.
2. Don't try to teach the traffic neurotic "a lesson" by giving him some of his

own medicine. He's the problem driver, not you.

3. If at some time or other you seem to

## 5 Rules for Keeping Your Nerves Steady While Driving

have a run of accidents or near-accidents, take time out to check your driving habits. If you find them faulty, try

to replace them with safer—and healthier—methods.

4. If you feel you are angry or perturbed—or even extremely overjoyed—don't drive immediately. Talk things over with your wife, try to understand your boss, take a walk for 15 minutes, or drink a glass of milk to calm you down. When you feel that your emotional upset has quieted, then it's safe to step on the starter.
5. "Compensate" when you feel tired or upset by driving slower than your usual speed; or use another road—one you're not accustomed to—so that your attention will be focused on new surroundings. Be doubly cautious at intersections and allow more room behind the car you are following.

Remember: ruffled nerves can lead to crumpled fenders. Keep calm behind the wheel.

—W. Schweisheimer

# Why Stainless Steel?

What makes its automotive future—  
like its own luster—look so bright?

by Jon Hauser

**M**ANY CAR OWNERS are surprised to learn of the comparatively large amounts of stainless steel being used today. Detroit, however, has to look at materials in the light of economy, as well as service. Stainless shines in keeping manufacturing costs down. The metal's extreme strength permits the use of manufacturing techniques that would literally tear other metals to pieces. As a result, today's car owner cashes in on the quality of stainless trim.

Not just pretty to look at, stainless trim pays off in two ways. First, it protects the body finish, thus making it easier to keep your car looking new longer. This yields the second advantage—a higher trade-in price. Car rental firms discovered these

factors long ago—look at their cars and you'll see only the high end of each line of cars they use. They can attract more customers with better looking cars and they can get better trade-in prices for them at year end.

Just a few of the many ways in which stainless trim protects today's cars are seen in the side moldings found on every line, which protect the side and quarter panels in close scrapes against garage doors or other cars, or when doors are opened in close quarters in parking lots. Stainless wheel discs, the king-size hubcaps, protect the wheel bolts and other parts. Window and windshield moldings add to the weatherproofing of the body by protecting the seals from the elements.

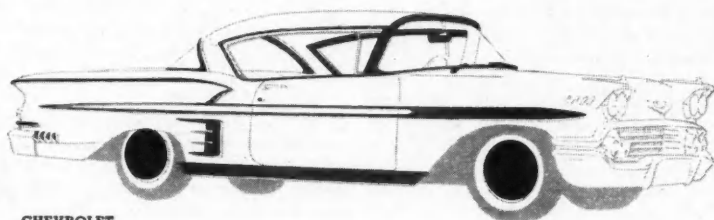
**THERE ARE MORE THAN 35** varieties of stainless steel made by the American industry. Standard grades which have been adopted for general use have been identified by the American Iron and Steel Institute with numbers to indicate their chemical composition. The numbers run in series—200, 300 and 400—to indicate the family to which any one grade belongs. The 200 series are chromium-nickel-manganese alloys, the 300 are chromium-nickel alloys, and the 400 series consist of the "straight chrome" or chrome alloy series. The 300 series include the grades which are loosely described as "18-8." One of them, Type 301, is used for almost every wheel cover supplied as original equipment by Detroit. (For other stainless steel uses, see "Spotlight on Detroit, page 10.)

Corrosion resistance is a big factor in the widespread use of stainless on today's automobiles and its future uses as well. It requires no plating, no specific surface treatment, no anodizing to resist corrosion. Because of this unique corrosion resistance, stainless steel holds broad possibilities for use in body and roof panels. It can be given a bright finish which will hold up for the life of the car.

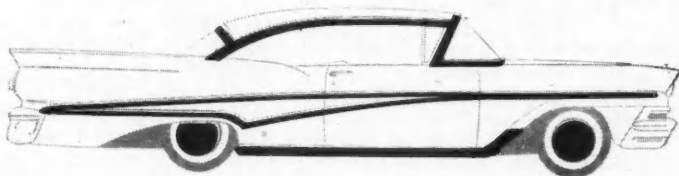
**THE BEST WAY TO CARE FOR** your stainless trim parts is to let them alone. The ordinary washing that you give your car is sufficient to keep stainless bright and new looking forever. Even road salt, salt air and shell roads are not as hard on stainless as on other materials. But, if your car is repeatedly exposed to salt, frequent washings with fresh water should be a rule to keep the entire body free of corrosion.

There are no special cleaners required for stainless; even harsh cleaners, such as used on whitewalls, won't hurt stainless as they do less corrosion-resistant metals. And while waxing or spray-coating other types of trim with lacquer is a good idea, stainless should be left completely bare. The presence of oxygen in the air, which is responsible for the corrosion of other metals, actually increases the corrosion resistance of stainless.

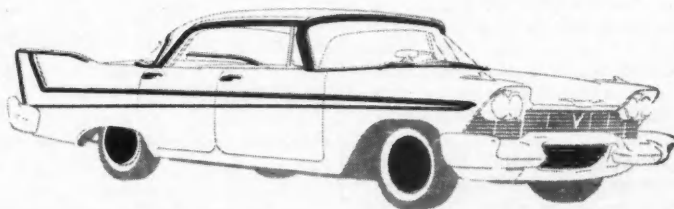
The next time you look at a new car, remember: all that glitters is not chrome.



CHEVROLET



FORD



PLYMOUTH

**TYPICAL USE** of stainless steel is shown by dark areas on above '58 cars.



**Q. POPULARITY RATINGS.** What is the most popular classic among enthusiasts? Richard Warden, Peoria, Ill.

A. We assume that the Duesenberg is the most popular, with Mercedes-Benz, Rolls-Royce and Cord close on its tail lights. This assumption is based on the standpoint that these are the cars that most enthusiasts would like to own if they could acquire them.

If by "popular" you mean which cars are owned by enthusiasts in greatest numbers, the answer would be Packard, followed by Lincoln and Cadillac, because these cars were produced in relatively large quantities and more of them exist.

**Q. OFFENHAUSER ENGINE.** Could I install an Offenhauser engine in my Jeep for quick starts and dependable service? Layman Hienselman, San Andreas, Calif.

A. We wouldn't recommend it. With all respect to this superb piece of machinery, it isn't ideal for street use. Why not use a powerpack '57 Chevy engine?

**Q. PERFORMANCE PLUS.** What is the easiest way to get all-around increased performance and still maintain dependability? Alf Johnston, St. Louis, Mo.

A. Supercharging is probably the best solution here, but we suggest only recognized and reputable makes for your consideration.

**Q. TIRE FORMULA.** The old high-pressure tires had number designations different from those used today. Is there a way or a formula to determine the diameter of the rim from the tire dimensions? Also, why was I charged more tax on a set of cheap tires than on a set of expensive tires? My dealer could not answer my question. Albert Sorensen, Wellington, B.C.

A. There is a very simple formula that can be used. Take as an example the 35 x 5 tire. Multiply the last digit by 2 and subtract this figure from 35. In other words, you double the width of the tire and subtract this figure from the overall diameter and this gives you the diameter of the rim.

Federal taxes on tires are computed at the rate of eight cents per pound on the weight of the tire and tube. Regardless of price, the tax is levied according to weight. It is, therefore, conceivable that the tax on a \$10 tire could be much

greater than the tax on a \$70 one.

**Q. NO PROBLEM.** I want to purchase an MG-A, but I hesitate because of the many stories I have heard about the problems involved in servicing the engine and keeping the carburetors adjusted. What is your opinion of the reliability of this car? Morton Forlgang, Lynbrook, N.Y.

A. Poppycock! The testimonials of many hundreds of MG-A owners prove the folly of such mis-statements. Like all high-performance cars, however, malfunction will be more noticeable, but normal maintenance is all that is required. Proper air balance is the secret of the carbs.

**Q. SMOOTH OPERATORS.** Can any determination be made as to which engine was smoother in operation—the Marmon V-16 or the Cadillac V-16? Robert Rossi, Bridgeport, Calif.

A. From cars still in existence it appears that the Marmon has a smoother engine. Many enthusiasts are disappointed with the Cadillac V-16. It is expensive to overhaul and definitely not economical. As a matter of interest, the Cadillac V-12 operates as smoothly as the V-16 and will actually outperform its larger brother.

**Q. INSULATION.** How can I attach sound-absorbing insulation to the underside of the hood on my 1957 Dodge, and what kind of material should I use? Jack De Rurve, Dayton, Wash.

A. We suggest spun glass insulation. This can be attached with insulating mastic sold at auto supply stores. For the spun glass, try a builders' supply house if your local auto specialty store doesn't stock it.

**Q. HILL CLIMBING.** Is it true that front-wheel drives such as on a Cord cannot go up a steep hill? Bert Hillary, Canton, Ohio.

A. It depends on what you call a steep hill. On a sharp incline weight is transferred to the rear part of a car. With conventional drive you get a better bite with the rear wheels on a hill than you get on level ground. Conversely, the steeper the hill, the less traction you have with the front wheels of a Cord.

The Cord will successfully negotiate the majority of mountainous roads to be found in America. You might find some that are so steep that the car cannot ascend them. On the other hand, when you consider this type of terrain, many conventional-drive cars would be hampered due to lack of sufficient power.

**Q. CONVERSION TABLE.** Could you please list the metric and English conversion table for linear measure? We are designing a car from foreign plans. Hotch Koss Club, New York.

A. 1 kilometer equals 0.6214 mile—1 mile equals 1.609 kilometer.

1 meter equals 39.37 inches or 3.2808 feet.

1 centimeter equals 0.3937-inch.

1 millimeter equals 0.03937-inch.

1 foot equals 304.8 millimeters.

1 inch equals 2.54 centimeters or 25.4 millimeters.

**Q. LEATHER OR NAUGAHYDE?** I have a Cadillac V-16 limousine. The leather top needs replacement. Do you recommend leather or Naugahyde? Henry Fisher, Oceanlake, Ore.

A. If you are restoring the car to concours condition, use leather even though it is very expensive. Naugahyde is much cheaper, looks like leather and under ordinary conditions will outlast leather.

If the car will be exposed to the elements, your best bet is Naugahyde. Leather has a tendency to expand, contract, shrink and deteriorate under given conditions. If the car will be babied and kept in a garage, leather will equal the life of Naugahyde. Given hard abuse, Naugahyde will last longer.

**Q. TRANSLATION, PLEASE.** I recently bought a special crankshaft which was turned from a block of steel. One end is punch-marked. "Contains Cd-Co-Mn-Cr." Could you possibly tell me what this means? Tony De Troy, Dallas, Tex.

A. We assume this is a chemical element listing but it would be a rather strange alloy—however, not an impossible one. If so, the symbols mean respectively—cadmium, cobalt, manganese, carbon and chromium.

**Q. REAL CORRODED.** How can I remove heads from a Lincoln V-12 which are so badly corroded that the block studs and heads appear to be welded together? John Murtagh, Bellingham, Wash.

A. You may or may not be able to save the heads. We soak all contact areas for a week in good grade penetrating oil. We then run the engine with all head bolts removed. Engine compression is sometimes sufficient to break the heads loose.

Another more expensive method is to obtain a hollow cutter which cuts away the metal around the studs so the heads can be removed. If the cutter makes a hole barely larger than the original stud holes the heads can be saved. You don't mention what year your car is, but the cast iron heads from a '33 Lincoln KA will fit later model V-12 engines. KA heads are at a premium because many others having had the problem you have, have ruined their heads.

It is impossible to answer any letters personally; we will answer the most interesting and most frequently asked questions in this column.







**GOOD NEWS TRAVELS FAST**

## **Bendix** ELECTRIC FUEL PUMP

For superlative engine performance

Among sports car fans news about an outstanding piece of equipment gets around fast. That's why so many sports cars today are equipped with the Bendix® Electric Fuel Pump. It makes sense, because the Bendix Electric Fuel Pump was designed and built for people who demand perfection. If you are one of those enthusiasts who insist that a

car deliver every last ounce of power and performance that was engineered into it, then you want to know more about the Bendix Electric Fuel Pump. When you've tried it, you'll never operate a car without it—even if it does cost a little more. (Send for illustrated folder.)



\*REG. U. S. PAT. OFF.



ELMIRA, N. Y.  
ECLIPSE MACHINE DIVISION

## The long, low look for every car, new and old



Fits most makes and models



Brilliant new 1958 trend-setting design concept, now available for your car. Interpreted by the world's foremost fender skirt maker!

With or without stainless steel molding. Easy to install, no holes to drill.

**Now!**

Custom Cruiser Skirts Are Available for Popular Makes and Models

★ New! **SCUFF PADS** to Protect Your Fender Skirts

Sold through auto supply, mail order & chain stores

Exclusive new **FLIP-WRIST Locking Action**  
Center-lock lever. A flip of the wrist installs or removes the skirt.

**FOXCRRAFT PRODUCTS** \* Huntingdon Valley, Pa.

**MT**  
next month:

Rugged comparison road test of the new **BUICK!**

MT picks the '58 **"CAR OF THE YEAR"**

May **MOTOR TREND** on sale April 17

In April

**HOT ROD**

on sale now!

Inside facts on the **'58 FORD**

... a **BIG** test report!

**HOT RODDERS** set new world **ACCELERATION** marks!

## AROUND THE WORLD IN THIRTY DAYS

### GERMANY

BMW is currently developing a four-cylinder, 1.5- or 1.6-liter car with their traditional sports car characteristics. If this new BMW can match the performance of cars like the Alfa Romeo Giulietta Sprint Veloce, it will undoubtedly find a ready market.

### GREAT BRITAIN

A production version of the Bond Mini-car Mark E economy runabout has recently been announced by the British makers, Sharp's Commercials Ltd.



New features consist of a substantial chassis frame, streamlined two-three seater with two doors instead of one, sliding windows and wrap-around windshield, full width parcel shelf and front and rear bumpers and overriders. The 197cc Villiers 9-E engine is retained, but the old three-speed gearbox is replaced by a four-gear positive stop unit, complete with a key-operated Siba Dyna-starter.

The Mark E also has the 180-degree steering lock of earlier models and so, in reverse, becomes extremely easy to maneuver and can be parked with only an inch of clearance at each end.

This latest Minicar has been extensively tested at M.I.R.A. and is said to have a top speed of 50 mph and cruising speed of 40 mph with an average gas consumption of between 80-90 mpg.

The steering column is shrouded. Facia panel is in plastic and instruments consist of a four-inch speedometer, ignition, lighting and concealed wiper motor switches and coil warning light and choke button. Steering column also carries the gearshift. The parcel shelf runs the full width of the car.

Since Bond Minicars first started production 10 years ago, about 20,000 have been made. Price of the new Minicar is \$1063, including purchase tax.

### SWEDEN

Applying lessons learned in the aircraft field to motor vehicles, Saab has announced a combined shoulder harness-seat belt for the new Saab 93-B sports sedan. Long an advocate of such a safety device, Saab builders have simplified optional self-installation by pre-stamped holes; the mounting operation takes only a few minutes. The harness-belt has been so designed that it never touches the floor, keeping it clean and immediately at hand.

Saab also announces that upon completion of a new factory now under construction at Trollhatten, Sweden, car production will increase 100 per cent in the next 24 months, bringing annual output up to 24,000 units.

**YOUR CREDIT IS GOOD  
WHEREVER YOU GO  
WHEN YOU CARRY A**

**ALL YOU NEED IS YOUR DINERS' CLUB CARD**

and a pencil to sign and say "Charge It" at the more than 14,000 recommended *Diners' Club* establishments all over the world.

In your own home city, touring the country, traveling abroad, entertaining for business or pleasure . . . carry one card and receive just one monthly statement of charges itemized so that no business expense is overlooked.

Bookkeeping records are simplified with no petty cash nuisance—no vouchers to sign. Your own accountant will verify this as **A VALUABLE RECORD FOR TAX PURPOSES.**

**ONE CARD—ONE STATEMENT—ONE CHECK**

More than 500,000 business executives, professional people, and travelers now carry the wallet-sized *Diners' Club* Card instead of dozens of credit cards and enjoy preferred VIP treatment everywhere. The *Diners' Club* Charge Establishments and Services include the world's finest **RESTAURANTS, HOTELS, NIGHTCLUBS;** the giant **HERTZ AUTO RENTAL SYSTEM;** the **CONGRESS OF MOTOR HOTELS** group; **PACKAGE LIQUOR STORES, FLORETS and GIFT SHOPS;** a network of **GASOLINE STATIONS**... and a host of many other extras. The *Diners' Club* gift service offers Gift Certificates and gifts to cover every occasion. Temporary office help and other business aids are available through **MANPOWER, INC.**

The **BEVERAGE GIFT SERVICE** enables you to send liquor on an interstate basis. The **DINERS' CLUB MAGAZINE** features articles by famed travel authorities and gourmets.

The *Diners' Club* Card is your credit "passport" that eases travel problems and insures red carpet treatment in the U.S.A. and 72 foreign countries. Your *Diners' Club* Card replaces money, but doesn't carry the same hazard of loss or theft that money does.

**YOU CAN'T AFFORD NOT TO BECOME A MEMBER OF THE DINERS' CLUB**

All this credit, convenience, and prestige costs you or your firm just \$5 a year — a modest fee indeed for so many benefits — so many extras. Additional membership cards issued to family or other executives on the same account, cost only \$2.50 per card.

**JOIN THE DINERS' CLUB TODAY—**

## MAIL APPLICATION TO OFFICE NEAREST YOU

NEW YORK CITY (1): Empire State Building  
CHICAGO (2): 33 N. La Salle Street  
LOS ANGELES (46): 910 N. La Cienega  
CLEVELAND (8): 1911 Terminal Tower Building  
ST. LOUIS (5): 7811 Carondelet  
WASHINGTON, D.C. (6): DuPont Circle Building  
NEW ORLEANS (12): International Trade Mart  
SAN FRANCISCO (4): 127 Montgomery Street  
CANADA: 1323 Bay Street, Toronto, Ontario

<b>DINER'S CLUB 910 N. La Cienega, Los Angeles 46, Calif.</b>		FOR OFFICE USE
Full Name _____		
Home Address _____	City _____	State _____
Home Phone _____	Rent Home _____	Own Home _____
		Year _____
Company Name _____		Nature of Business _____
Address _____	City _____	State _____
Business Phone _____	Years with above firm _____	Position _____
Bank and Branch Address _____		Reg. Checking <input type="checkbox"/>
		Spec. Checking <input type="checkbox"/>
		Savings <input type="checkbox"/>
		Loan <input type="checkbox"/>
Charge accounts of _____		
<div style="border: 1px solid black; padding: 5px; display: inline-block;"> <b>CHECK ONE ONLY</b>          COMPANY ACCOUNT <input type="checkbox"/>          Bill to office address          PERSONAL ACCOUNT <input type="checkbox"/>          Bill to home address          PERSONAL ACCOUNT <input type="checkbox"/>          Bill to office address       </div>		
Have you applied previously? _____ If addition to existing account, show number _____		
\$5 FEE: ENCLOSED <input type="checkbox"/> BILL ME <input type="checkbox"/> covers twelve months' membership from date card is received and includes one year's subscription to Diners' Club Magazine at sixty cents.		
Card holder assumes individual responsibility with company applicant		
Signature of individual applicant _____		
Signature of executive authorizing company account _____		
		Title _____



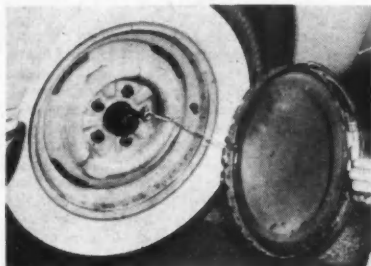
# TRENDS in New Products

**WRAP 'N' SNAP!** That's all the instruction needed to install this new license plate frame. Made of plastic, it springs open to slip easily around the license plate and lock



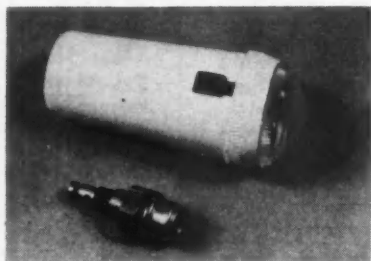
securely with a small metal clip. It requires no screws or bolts, won't rust or tarnish, rattle or squeak. It's available in black, gold, silver, or white, and will sell for less than a dollar. Van Dale Co., Cypress, Calif. is the distributor.

**"THEFT-PROOF"** hubcap lock incorporates a new approach to hubcap locking devices,



featuring a lugbolt-to-hubcap locking cable. Constructed from "snip-proof" aircraft-type cable and polished fittings, it doesn't interfere with valve stem in any way. It's priced at \$2.95, available from Something on Wheels, Box 1208, Hollywood 28, Calif.

**THIS TROUBLE-FREE** trouble light is cordless; yet, it is always ready when you need it. The Lightboy is mounted out of the way under the dash and connected to your car's electrical system; it recharges itself from your car battery, drawing less current than your



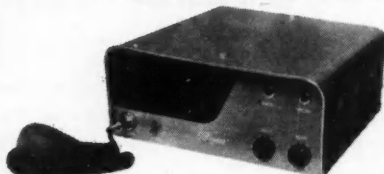
dash clock. A quick twist and it is free to give 1½ hours of brilliant illumination. Cost is \$5.75; specify car voltage—6, 12, or 24. It is available from German Motor Cars Parts & Accessories Depot, Dept. M, 1918 W. 8th St., Los Angeles 57, Calif.

**NEW METHOD** of wheel balancing makes it impossible for the weights to spin off at high speeds or to scrape off against curbs. Gyroscopic action provides a strong safety factor,



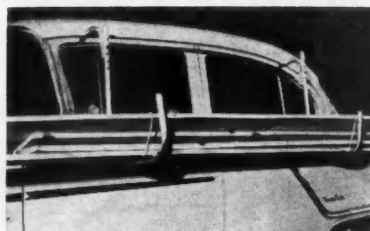
eliminating road weave and wander, and dampening road noises. Tire life is claimed to be increased, and wear on front end and shock systems is greatly reduced. Hub-O-Matic consists of a circular steel frame with movable weights adjustable over a 360-degree range. It bolts firmly under the lugbolts and is concealed and protected at all times beneath the hubcap. Selling at \$5 per wheel, it can be transferred from wheel-to-wheel and car-to-car, giving owners years of use. They are obtainable from Hub-O-Matic, Inc., W. 503 Indiana, Spokane 17, Wash.

**LOW-PRICED FM MOBILE** radiotelephone has been developed that can be licensed for use by any citizen of U.S. for communicating between vehicles and fixed points, from one



vehicle to another, and between two or more fixed points within a 10-mile radius. When a repeater station is used, ranges up to 50-200 miles can be obtained, depending on the effective elevation of the repeater station and the character of the terrain. It is available as a complete single package unit, suitable for mounting under the dash or on any flat surface; or as a system containing the transmitter, receiver, and power supply in one unit suitable for mounting in the trunk, with a separate control head and speaker for mounting under the dash. In either case, the radiotelephone may be operated directly from a 12-volt battery or 117 volts AC (house current) and may be used interchangeably as a mobile unit or base station. Detailed information about the new Kaar TR500 and TR501 radiotelephones may be obtained from the Kaar Engineering Corp., 2995 Middlefield Rd., Palo Alto, Calif.

**LIGHTWEIGHT ALUMINUM** carrier can be attached in a few seconds to either side of a car. With addition of a simple bracket, it is also quickly adapted for use on most panel



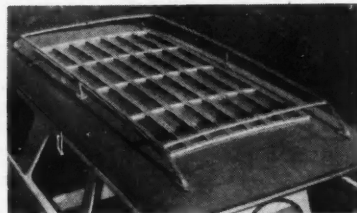
and closed trucks as well. It carries up to 150 pounds in complete safety and will not vibrate, loosen, shift under load, or mar the vehicle in any way. It handles such items as lumber, rugs, pipes, tubing, poles, skis, fishing equipment with ease. When ordering, specify type of car. It's priced at \$9.95 and is available from Kip Co., Dept. 52, P.O. Box 235, Livingston, N.J.

**NEW YELLOW-AMBER GLASSES** designed especially for night driving have been developed as a safety item. The glasses, called Glare Bar Night Glasses, have optically correct lenses and are designed to minimize the



fatiguing effects of high-level artificial illumination without reducing overall visibility. Frames are of durable shell plastic, adjustable to facial contours, and are available in attractive styles for men and women. Glasses are offered at \$2.98 each, including carrying case. They are available from General Scientific Equipment Co., 7516 Limekiln Pike, Philadelphia 50, Pa.

**LARGE CARRIER** for station wagons is factory-assembled and has an all-aluminum platform. Measuring 36 by 72 inches, it consists of five cross-bows with extruded rubber set



into their under-surface, and eight longitudinal extruding shapes. Each siderail is one piece and when shipped has all the stanchions factory-mounted. All that is required to install is to fasten the end rails with four bolts and install from outside the car with stainless steel sheet metal screws. All parts ride on soft rubber for positive sealing and minimum rumble. Priced at \$89, it is available from the Canell Co., 45 Liberty St., Little Ferry, N.J.

# WEAR FOR SALE

**\$114.00 PER OUNCE!**

Would you pay that much for a handful of ground-up cast iron? Obviously not. But that's just what you do pay for the metal that is worn from your cylinder walls. An engine job costs about \$285 today—on the less expensive cars. The difference in weight between a new, powerful, high-performance engine and a worn out, tired, wheezing, oil-consuming clunker is just  $2\frac{1}{2}$  ounces. A mighty important  $2\frac{1}{2}$  ounces when it is taken, as it is, from the tops of the cylinder walls. That "lost" metal opens up the clearances between the pistons and the cylinder walls with well known results. Each 1,000 miles you drive normally costs about \$3.00 in engine wear alone. You can't avoid it—unless you can stop the gradual wearing-away of this vital metal. Even a few thousand extra miles can be worth a sizeable investment.

## CAN YOU TRAP WEAR?

We think you can! First you have to understand what is causing your engine to wear out. Do you know that the same kind of car you are driving can go up to 250,000 miles without an overhaul? It can if it is driven only on long trips at medium high speeds. Yet the same kind of car, driven on short trips, will be worn out in 55,000 or 60,000 miles. Why should that be? The engines turn over about the same number of times; the pistons go up and down the same; the bearings get the same number of revolutions—at probably a lighter load. Short trips do not warm up the engine and oil enough to dry out the water moisture that collects inside every engine. This water mixes with burned gases and is the starting point for powerful acids. These acids nibble away at your engine parts. They also go to work on your oil, causing it to break down

sooner. Anything you can do to reduce "corrosive wear" will pay handsome returns. Using Magna-Power is just one step you can take to reduce wear—but it is a giant one.

Magna-Power is a bar of a special alkaline metal alloy attached to the crankcase drain plug. It replaces the one in your engine now. The alloy is in contact with your oil at all times—and at the lowest point in your engine. It destroys corrosive acids as they are formed—before they have time to build up enough to destroy your engine. The alkaline metal alloy in Magna-Power also has a very powerful influence on how much sludge-forming resins build up in the oil. It slows this 'way down so that parts stay exceptionally clean and your filter operates much more effectively. Thus Magna-Power not only reduces wear but also cuts sludge and gum formation by a large factor.

You are assured of not only a longer lasting engine but a better, more powerful one, free from the drag of the filth and goo that are gathering in your engine now.

## SAVE \$\$\$ ON OIL

Your engine will stay in new condition much longer. Many engines actually improve their oil mileage with Magna-Power.

## SAVE \$\$\$ ON SPARK PLUGS

Spark plugs give top performance much longer without the damaging effects of acids and impurities brought to them by the oil.

## SAVE \$\$\$ ON GASOLINE

You will be amazed at how your engine will give top performance for

many thousands of extra miles. Its average miles per gallon will improve greatly by holding its own instead of going steadily downward.

## YOU'LL WANT THESE BENEFITS FOR YOUR OWN CAR

Send for your Magna-Power now; have it installed at your next oil change and start your car on the road to the best performance you have ever had. You can be sure that Magna-Power has the proper alkaline alloy—reliable and safe as shown by years of testing and a million satisfied, happy owners. It is only \$2.95 PPD. for the Magna-Power itself. Special offer: Kit of 3 anti-corrosion Products—\$4.95. This Kit consists of: 1) The Magna-Power, 2) an alloy-chemical anti-oxidant fuel treatment and 3) an alloy-chemical anti-corrosion device for the cooling system. All products are sold on a satisfaction—or money-back guarantee with no time limit.

## FILL OUT THE COUPON BELOW

Available for all U.S. and foreign cars, trucks, buses and many other engines. DEALERS—write for details. In Canada: Magna-Power Sales Co., 190 Brookside Ave., Toronto 9, Ont. In Mexico: Johns Mfg. de Mexico S.A., Sinaloa 215, Mexico 7 D.F.

**Johns Research Laboratories  
Dept. M-4, Middlesex, N.J.**

-----  
JOHNS RESEARCH LABORATORIES  
DEPT. M-4, MIDDLESEX, N.J.  
My car is a \_\_\_\_\_ (make) \_\_\_\_\_ year  
I enclose \$\_\_\_\_\_. Please send me postpaid,  
☐ Magna-Powers at \$2.95  
☐ Corrosion Kits at \$4.95  
(consisting of the 3 items above)  
SAVE ON 2ND & 3RD, ETC., \$1.00 disc. ea.  
Please print  
Your name \_\_\_\_\_  
Address \_\_\_\_\_  
City, Zone, State \_\_\_\_\_

## REUPHOLSTER with a BRUSH!



Renew dull, faded, worn leather or Vinyl plastic upholstery. Car, plane or boat seats, headliners, sidepanels will look new in any color. Redesign, customize new interiors. You can change color too! Easily applied brush or spray. RamCote Flexible

Finishes (not a paint) impregnates leather or Vinyl plastic upholstery. Won't chip or peel. Fade-proof — waterproof. Write for free information, color chart, and dealer location.

RAMCOTE, 1141 W. 89th St.  
Chicago 21, Ill., Dept. MT-4



## CLOGGED SEWER Remember The COSTLY PLUMBING BILL —

CHICAGO—April 1st. Just introduced in a Free Booklet on a New Discovery which enables the Home Owner, Janitor, or Factory Maintenance to clean any Clogged Sewer Drain.

Yet anyone can operate this new Plumbers Flushing Gun which releases air pressure on a solid shaft of water cleaning the most stubborn stoppages up to 200 feet. TOILETS, SINKS, URINALS, BATHTUBS, FLOOR DRAINS, and HOUSE-TO-STREET SEWERS clogged with Grease, Rags, Sand, Roots, and paper melt away instantly when struck by the Hammer-like blow of this new unit.

There is no need to remove wall or pipe, or Grease Trap. A special attachment allows water flow from the faucet through the Gun while air is released on the pipe. Vents or stacks are no obstacle, as force tends to strike wherever the water lays. But now, what is this Plumbers Flushing Gun worth? **COSTLY PLUMBING BILLS SAVED!** Test this Ad out—write your name and address beside for **FREE BOOKLET**. Obey that urge. No agent will call. A postcard will do. (Chicago Phone 444-9455) **MILLER SEWER ROD CO., DEPT. AU-4 4640 N. Central Ave., Chicago 35, Illinois.**



## AMAZING NEW TRANSISTOR TACHOMETER

ONLY **\$39.95** high, 3 1/2" wide, 2 1/4" deep. • Complete package—no extras to buy. • Transistor circuit assures accuracy. • Fits all V-8 12-volt autos, trucks. • Single unit—no sender required. • Universal ball joint mounting. • 3/4" F.O.B. COMPLETE! Send check or money order today—sorry no C.O.D.'s. If you live in Illinois, Ill. add 2 1/2% Illinois USE tax.

**RADSON Engineering Corporation**  
MACON, ILL.

## PORTABLE CAR COVER

Protect Against RAIN • SUN • DUST Heavy Vinyl Plastic (formerly \$8.95)  
Long-lasting plastic, folds compactly, off and on in a jiffy, sturdy elastic binding gives extra security. State make, model and year.

Send \$4.95 plus 35¢ postage or sent C.O.D. Extra Heavy Plastic Gauge \$8.95 + 45¢ postage  
CRYDER SALES CORP., Dept. E-64, Box 79, Whitehouse 57, N. Y.

## BOOK MANUSCRIPTS CONSIDERED

by cooperative publisher who offers authors early publication, higher royalty, national distribution, and beautifully designed books. All subjects welcomed. Write, or send your MS directly. **GREENWICH BOOK PUBLISHERS, INC.**  
Attn. MR. COBB—489 Fifth Ave., New York 17, N.Y.

## \$1,000,000 CONFEDERATE MONEY

Be a deep-south millionaire with money to burn. You can do everything with this money except spend it. A million bucks in \$10's, \$20's, \$50's, etc. You get a million in authentic reproductions of genuine Confederate money plus bonus bills for \$2.98 or four million for \$10. Postpaid.

**BEST VALUES CO., Dept. M271,**  
463 Market Street, Newark, N.J.



# PRODUCT USE TEST

## MILEAGE MINDER

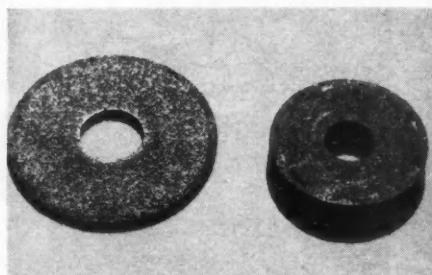
**FUEL SYSTEM TROUBLES** in the form of dying, stalling, flooding, and poor fuel economy are a frequent and annoying bugaboo. They are not, however, incurable. In fact we found the solution quite simple in a recent actual-use test of the Paser Manufacturing Co.'s Mileage Minder.

The heart of malfunctioning in most fuel systems is at the carburetor needle seat. As the needle responds to signals from the float it must seat exactly with dependable precision even though its action reaches a fluttering speed.

The two major causes of trouble at the needle seat are foreign matter in the fuel and fluctuating fuel pump pressures. Since the fuel pump forwards gasoline to the carburetor with a cam action, the pressure alternates between full thrust and zero thrust. This means that on the thrust cycle pump pressure may be multiplied to a point where the needle is prevented from seating properly and the result that flooding occurs with corollary engine stalling. Foreign matter can also prevent the needle from seating properly and the results are similar. As the needle is prone to become magnetized by the flow of fuel, metallic particles are particularly troublesome.

The Mileage Minder is designed to eliminate these common fuel system troubles. A spring-loaded two-ply neoprene diaphragm absorbs and cushions fuel pump pulsations. A sintered bronze filter screens general foreign matter and as the fuel must pass through the field of a ceramic magnet, metallic particles are trapped.

We were familiar with the Mileage Minder (See "Fuel for Thought," Oct. '57 MT) having previously installed one on a '55 Buick Special which exhibited the usual stalling tendencies and erratic idling after each hard application of the brakes. Later we installed the new model unit with the metal bowl and magnet.

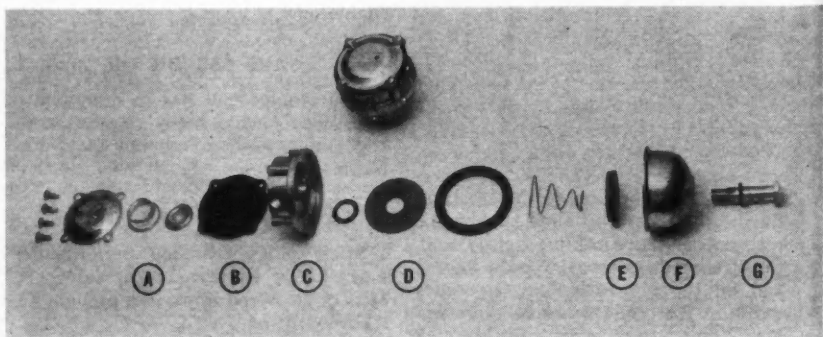


**AFTER ONLY 500 miles of driving metallic particles were found adhering to surfaces of the ceramic magnet.**



**MILEAGE MINDER on '55 Buick Special**

The stalling tendencies and rough idling cleared up shortly after the original installation was made and there was no repetition when the second unit was tested. Stalling as a result of flooding results in waste of fuel. When this was eliminated we found the fuel consumption was lessened from one to 3.8 miles per gallon, depending on where and how the car was driven. —MT Research Report



**FUEL ENTERS** Mileage Minder head (C), passes into bowl (F) through tube (G). After passing through field of magnet (E), it flows through sintered bronze filter (D). Fuel pulsations are dampened by diaphragm (B) and spring (A).



## SELL 'N' SWAP

Requirements are: copy limit of 25 words (not including name and address); 1st come, 1st served; we reserve the right to edit where necessary; we are not responsible for accuracy of description, although we will reject any misleading statements. This service is not open to commercial advertisers. No ads will be accepted if payment is not made in advance, and such communications will not be acknowledged. Only one CAR may be listed in any single Sell 'N' Swap insertion. This limitation will not apply to parts, catalogs, etc. The charge is \$4 per insertion. If your car is unusual and you have a photo of it suitable for publication, you may submit it with your ad. If we decide to print it there's no cost to you for the cut, but we'll have to decide which photos to use. Sorry, no photos can be returned.—Editor

### SELL

'25 BENTLEY 3-liter touring phaeton. All orig. parts. \$1650 invested; sell for best cash offer f.o.b. Chattanooga. All inquiries answered; pix on request. No trades. Neil McDade, P.O. Box 851, Chattanooga 1, Tenn.

'14 BUICK rdstr. Restored & runs perfectly; 5 new tires, new paint & uph. Won concours firsts in



'56-'57. \$1100; with spare engine, radiator, clutch, tires—\$1200. J. W. Morton, 176 Gregory Lane, Salem, Ore.

'46 LINCOLN CONTINENTAL hdtpr., with Olds engine & Hydra-Matic. Real clean, body perf., paint fair. Real sound thruout. Will deliver up to 300 mi. \$1400. Abe Walker, 2424 Bream Ave., Augusta, Ga.

'29 WILLYS-KNIGHT sed. with sleeve pistons. Body in good cond., also good running cond. Best offer accepted. F. F. Smith, 325 Runyon Ave., Middlesex, N.J.

'29 OLDSMOBILE in good running cond. Exc. uph. Only 45,000 actual mi.; a good strong car. \$300. Elmer Kurtz, Canfield Rd., Rt. 1, Columbiana, Ohio.

'47 LINCOLN CONTINENTAL hdtpr. '48 Ford V8 engine, brakes, o.d., clutch—all installed new in

'56. White, with custom uph., ww's, R & h, dual carburetors. \$1000. R. T. David, 67-18 211th St., Bayside, L.I., N.Y. Phone BA 5-8768.

'41 CADILLAC Series 60 conv. New paint, new top, rebuilt engine, perf. automatic transmission, good tires. Uph. needs repair. Asking price \$500. R. C. Hanson, Box 75, Hancock, Mass.

'38 MERCEDES-BENZ Model 320 2-dr., 5-place conv. Alpine white, upholstered in Vienna; new paint & chrome. Manual o.d. behind 4-gear synchro



box, auto luber, 4-wheel independent suspension. \$1300. Jerome R. Poschel, 1234 E. Seminole, Springfield, Mo.

'47 LINCOLN CONTINENTAL hdtpr., with orig. V-12 engine. Black, mint cond., orig. thruout; new General ww's, 23,000 mi.; one of 10 automobiles from estate. \$2000. John J. McCann, 894 Glenbrook Ave., Bryn Mawr, Pa. Phone LAwrence 5-2861.

'28 HUPMOBILE Century sed. Sidemounts & trunk, disc wheels. Complete; unrestored but licensed & running. \$150. Charles Paine, 426 15th Ave. S.W., Rochester, Minn.

PACKARDS? You bet! Four years strong as an organization with nationwide membership. Monthly lively newspaper. For details contact Secretary, Packard Automobile Classics Club, 1025 Keeler Ave., Berkeley, Calif.

WATER PUMP—Model T Ford, M & K, patented 1923. Complete & in good working order. Robert E. Van Curen, 41 Ledgewood, Bedford, Ohio.

'35 FORD phaeton in exc. orig. cond. Black, with white top & ww's, green wheels & pinstripe. Radio & luggage rack. Top mechanical shape. \$750. Stuart Molyneux, 226 Hyde St., Watsonville, Calif.

POWERFUL HEADLIGHTS! Quadri-beam headlights for all pre-'58 cars. Simple wiring change—costs you 60¢ & 15 min. Wiring diagram, full instruc-

continued

## YOUR TACH tells you . . .



**CORVETTE for 1958**  
leads the field as the  
**NUMBER ONE American**  
**SPORTS CAR.**

### ENOCH CHEVROLET COMPANY leads in CORVETTE sales!

Because of our tremendous sales volume of NEW & USED CORVETTES, ENOCH now offers the greatest

• SAVINGS • SELECTION • SERVICE •

Now available in your choice of engines, drives and two-tone colors.

#### ORDER CORVETTE PARTS & ACCESSORIES BY MAIL!

We have a complete stock of Corvette Parts & Accessories for 1953-1958 models. If you are having difficulty securing any Corvette Part or Accessory, Enoch Chevrolet will ship C.O.D. to any city in the U. S.

#### CORVETTE CORNER

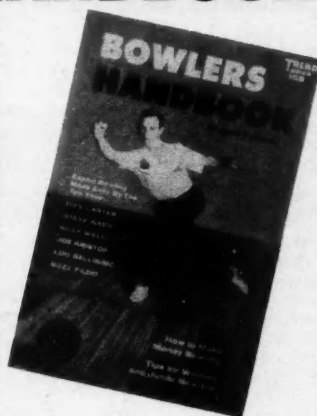
#### ENOCH CHEVROLET COMPANY

8730 LONG BEACH BLVD., SOUTH GATE, CALIF. • PHONE LORAIN 7-2121

#### ON SALE NOW!

## BOWLERS HANDBOOK

*Designed to add  
50 pins to your score.  
It's packed with action  
photos of champs like  
Kristof, Carter, Catalano.  
You'll especially go for the  
sequence photos illustrating  
the fine points of spot and  
pin bowling, grip, stance,  
delivery. Plus chapters on  
league play, TV bowling.*



ONLY

**75¢**

EACH AT  
YOUR  
NEWSSTAND!

(or mail  
your order  
today!)

#### TREND BOOKS

5959 Hollywood Blvd., Los Angeles 28, Calif.

I am enclosing \$\_\_\_\_\_ @ 85c each (to cover postage, etc.)

Please send me: \_\_\_\_\_ copies BOWLERS HANDBOOK.

NAME \_\_\_\_\_

ADDRESS \_\_\_\_\_

CITY \_\_\_\_\_

ZONE \_\_\_\_\_

STATE \_\_\_\_\_

## STOP FRONT DRIVE DRAG ON YOUR Jeep



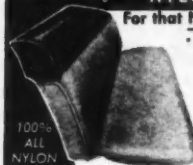
**WARN  
HUBS**

Over 100,000 new in use!  
Warn Hubs free-wheel 4 w.d. in 2 w.d. for savings in gear wear, tires, gas, plus more pep, speed and handling ease. Either model—automatic Lock-O-Matics or manual Warn Locking Hubs will save you money. Models for all 4 w.d. to 1½ tons.  
SEE YOUR DEALER!  
**WARN MFG. CO., Inc.**  
Riverton Box 6064-F4  
Seattle 88, Washington

## CLASSIC CAR CLEARING HOUSE

Always 30 American and Foreign Classics in stock. We maintain a list of Classics Wanted & For Sale. Write us what you wish to buy or sell.  
Antiques - Classics - Foreign Sports Cars  
**VALERIE MOTORS, INC.**  
620 W. Boston Road, Mamaroneck, N.Y.

## TWO-TONE NYLON SEAT COVERS



100%  
ALL  
NYLON

For that NEW LOOK in your car  
• EASY TO INSTALL  
• DURABLE, WASHABLE  
Dresses up your car's interior. Washable, gives your upholstery long-lasting beauty & protection. To install, simply slip over seats. In navy, blue, green, tan and white combinations. \$2.98 for front split, or front or back solid. Set \$5.75. Add 25¢ postage or sent C.O.D.

10-DAY MONEY-BACK GUARANTEE

**CRYDER SALES CORP.** Dept. P-41  
BOX 79 WHITESTONE 57, N. Y.

## JACKET EMBLEMS



**LADY LUCK**  
Red embroidered on black velvet  
12" Felt Emblem — 25¢  
10" Felt Emblem — 50¢  
10" Felt Emblem — 1.00  
Details available in same sizes at the same price. Specify when ordering.

**PERSONAL NAME EMBLEMS**  
Red embroidered on black velvet  
12" Felt Emblem — 25¢  
10" Felt Emblem — 50¢  
10" Felt Emblem — 1.00  
Details available in same sizes at the same price. Specify when ordering.

**SPOT ENTERPRISES** P.O. Box 66  
Culver City 8, Cal.

## FOR AUTOS, TRUCKS, BOATS



## SAVES GAS!

Sensational, New!  
**FILT-O-REG** with Magnet  
FUEL PRESSURE REGULATOR-FILTER

**FILT-O-REG** will make your engine run smoother. Saves Gas. Gives quicker starts and re-starts. Prevents flooding, stalling, and vapor lock. Lengthens carburetor and fuel pump life. Filters fuel completely. Magnetically traps harmful iron oxide that may clog carburetor needle valve. Only \$7.95  
Satisfaction Guaranteed

Write for FREE TECHNICAL BULLETIN 302-MT

**Alondra Inc., Los Angeles 19**  
Recommended by Carburetor Specialists everywhere

## KNOW all used car values instantly — 1949 thru 1957 Also 1958 factory prices

Send \$2.00 for 128-page book  
**AMERICAN AUTO APPRAISAL**  
190 Grove, Detroit 3, Michigan • Estab. 1923

## SELL 'N' SWAP

continued

tions, \$1. G. H. Carroll, 839 N.E. 35th St., Oklahoma City, Okla.  
34 PACKARD V-12 conv. victoria, with custom body by Keller-Eichelbaum, Berlin. One-of-a-kind classic, imported & restored in 1955. See Nov. '56 MOTOR TREND, page 42. \$1600. H. W. Kranz, 498 Edinborough Dr., Bay Village, Ohio.  
CORD 812 Westchester trunk sed. 500 mi. on rebuilt engine & transmission; U-joints good. In storage 2 yrs. Needs paint, glass. \$750 or best offer. Brad Rockett, 257 Marked Tree Rd., Needham 92, Mass. Phone HILcrest 4-4661.  
'49 MG-TC classic rt.-hand drive sports. Engine perf. Body orig. & complete, needs minor work & paint. Interior orig. & complete; in fair cond. Chrome access. Firm \$950 Canadian funds. J. Konrad, Nault P.O., Manitoba, Canada.  
'48 LINCOLN CONTINENTAL hdt. Chrome & finish perf. R & h. o.d., like-new Firestone w.w.s. 41,000 orig. mi. \$2000 or best offer. P. R. Rasmussen, 2626 Kenilworth Ave., Wilmette, Ill.  
'48 TUCKER—Preston Tucker's personal car; Serial No. 29. 18,714 actual mi., paint good, uph. exc.,



engine completely rebuilt. Puncture-proof w.w.s. r & h. Best offer over \$3000. A. J. Gayson, 11157 S. Main St., Los Angeles.  
MOTOR (N.Y.) Annual Show numbers 1922 thru '43, \$5 & up. Orig. magazine ads & color prints of all the great classics, also non-classics. Complete 10-page listing 25¢. Sheldon J. Lewis, 61-33 213th St., Bayville, L.I., N.Y.

**WORLD'S GREATEST MOTOR CARS**—11" x 14", doubleweight, glossy photographs of the greatest motor cars the world has ever known. 12 for \$15, postpaid & insured. Set of Duesenberg specification sheets included free. Limited offer. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
CATALOGS, MANUALS, books, magazines, photos, ads, etc. on antique, vintage, veteran & classic cars. Complete listings \$1—refunded with 1st order. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.

**ANTIQUE, VINTAGE & VETERAN CARS** Parts Directory. Lists names & addresses of sources of supply for parts & supplies for most orphan cars. \$5, postpaid & insured, including set of Duesenberg specification sheets—11" x 14". A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
2 TIRES—5.50-5.75 x 17, Firestone & U.S., including tubes & 1 wire wheel. Exc. mint cond. \$50, shipped with all express charges prepaid. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
CADILLAC PARTS—2 rear springs, 2 front coil springs, 2 front & rear shocks, front & rear inner & outer wheel bearings & Universal joints. All in exc. cond. Fits all Cadillacs from 1941 thru '48. \$50 for everything; shipped postpaid & insured. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
'38 PACKARD Straight 8 conv., custom-built by Werner-Risch of Zurich, Switzerland. Good cond.



Priced for quick sale—\$2200. Darcy DeLong, Rt. 1, Box 50, Anaconda, Mont.  
'56 MUNTZ JET Special, with Lincoln running gear, full-race Cadillac 375-hp engine, 12-volt system, Bendix brakes, Red & black, with white top. Performance & cond. exc. Sell for tax purposes at less than half-cost. Emil A. Widmer, 919 Ainslie, Chicago.  
TRIPPE SENIOR DRIVING LIGHTS—world's most powerful—specially made up for show purposes, with plated & polished brackets & fittings. German silver reflectors. \$50 pr. Trippie Jr. made up same way—\$35 pr., postpaid & insured. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
REDI-WARM automatic engine starters. Enjoy summer starting all winter long. Complete kits with instructions reg. \$39.50 sacrifice for only \$25, postpaid & insured. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
CLASSIC & ANTIQUE CAR CATALOGS: Packard, Chrysler, Lincoln, Cadillac, Pierce-Arrow, Buick, orphan & foreign cars; minimum \$5 each. Also MoToK (N.Y.) Annual numbers. Details for large,

stamped, addressed envelope. A. E. Twohy, 400 N. Kenmore, Los Angeles.  
MARSHAL driving & fog-lights—used by the world's finest motor cars. In orig. cartons. \$60 pr., shipped postpaid & insured. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
LORRAINE SPOTLIGHTS—the world's finest spotlight. In orig. cartons. \$35 ea., shipped postpaid & insured. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
2 BRAND-NEW TIRE MIRRORS. Fits all classic cars. \$35 pr., shipped postpaid & insured. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
SCALE MODEL CARS—some 1956-'58 available. Ideal for planning customs or collecting. Chrysler, GM products—bargains. Also other domestics & foreigners. Write for list. George V. Flagg, 1470 Keyes Ave., Schenectady, N.Y.  
'49 INVICTA rare Black Prince drophead cpe. Mechanically perf., except Reverse gear. Body, interior exc. Only one in U.S. \$1800. James L. Killion, P.O. Box 1060, San Jose, Calif.  
'39 MORCH-AUTO UNION. V8 engine, 4-speed transmission plus o.d. Good mech. cond.; needs top, 2 spare tires, \$2000 or best reasonable offer. Kenneth E. Lutz, Jr., 209 N.W. Avenue C., Belle Glade, Fla.  
'48 LINCOLN CONTINENTAL cabriolet. This is truly a museum piece—therefore, would appreciate it if only those interested in such a collector's item would reply. Glenn H. White, P.O. Box 466, Canton, Ohio.  
'29 CHRYSLER 75 rdstr. 6 wire wheels with side-mounts; new paint. Mostly rebuilt; still needs small amount of work. Best offer over \$450. Glen E. Shook, 1681 S. Muskego Ave., Milwaukee 4, Wis.  
'31 MODEL A landau with rumbleseat. Orig. cond. thruout, including 19-in. wheels, bumpers, lights, etc. Very fine running cond. \$250. Eamon F. Rutledge, R. R. No. 2 Box 409, Berrien Springs, Mich. Phone Greenleaf 3-3028.  
FORD T PARTS—widest range, lowest costs. Most mechanical parts, many body parts available. Free listing on request. Also Ford "A" mechanical parts listing free. E. R. Hemmings, Quincy, Ill.  
AUTOMOBILE LITERATURE—1946 thru '58. American, foreign, sports, dream, experimental & limited production cars. Over 750 pieces. \$100 takes all or will sell separately. Larry O. Smith, R. R. No. 1A, Clyde, Ohio.  
ATTENTION, MODEL T LOVERS—10 Model Ts to sell immediately, including coupes, sedans, touring & convertibles. Prices \$200 & up. State car you desire. Pix 25¢. Philip Barcus, 609 Illinois St., Plainfield, Ill.  
'36 PACKARD 120 victoria, with rare alum. body by Hibbard. Removable forward plexiglass top.



Engine, transmission, rear end o'hauled; exc. cond. Daniel S. Zittman, 1636 N. Rockwell St., Chicago 47.

'49 MG-TC—ready to go. Good mech. cond., good rubber, perf. body, top serviceable; wire wheels. Make offer. J. L. Harmon, P.O. Box 49, Tallulah, La.  
'47 LINCOLN CONTINENTAL hdt., with 48 MG engine in good cond. Exc. body, all-leather uph. New clutch; transmission very good. Absolute sacrifice—\$750, pix available. S/Sgt. Robert G. Flohre, 1261 Incheon St., Tarawa Terrace, N.C.  
'33 PACKARD 12 close-coupled sed. 4 new 7.00 x 17 6-ply tires, new chrome. Rest of car in very good cond. Drive anywhere—fast! \$900. L. Dunkl, 917 Crosby St., San Diego 13, Calif.  
'32 PLYMOUTH PB sport rdstr., with 2 spare wire wheels in fenderwells. Free wheeling. Suitable for restoration. Will sell for best offer. P. A. Douglass, 420 Green Ridge St., Scranton, Pa.  
'15 RAUSCH & LANG dual-control coach in incredible orig. cond. Priceless nickel battery, 2 chockers, spare parts. Runs perfectly. Can deliver; genuine inquiries invited. Earl D. Potter, 8811 W. 102nd St., Rt. 4, Oak Lawn, Ill. Phone GARDen 2-3552.  
COLLECTION of Antique & Classic cars. Open: 1899 horse ambulance, 19 Ford, \$350; '24 Nash, \$450; '30 LaSalle 7-pass. restored; '30 Cord; '35 Packard, rough. G. F. Wood, 9 Brimmer St., Boston, Mass. Phone LAfayette 3-6679.  
CLASSIC SEDANS: 1846 hearse; '12 Mack; '24 Pierce, exceptional; '26 Cadillac; '28 Buick, clean; '29 Stutz LeBaron; '37 Lincoln, immac.; '37 Packard 12; '38 Lincoln Willoughby. G. F. Wood, 9 Brimmer St., Boston, Mass. Phone LAfayette 3-6679.  
CLASSIC PARTS & ACCESS—tires, brass bulb-horn, new \$50. Essex 4-cyl. rdstr. top—new, complete—\$50. Used tires—7.00 x 21, 19 x 18, 17. Metal trunk \$50. Many other items; list available. G. F. Wood, 9 Brimmer St., Boston, Mass. Phone LAfayette 3-6679.

## SELL OR SWAP

'38 GRAHAM 4-dr. sed. Orig., immac.; 35,000 mi. Excellent mechanically; drive anywhere. Orig. title. \$195 firm, or trade for what-have-you? Rev. Robert

H. Miller, Box 292, R. R. 13, Evansville, Ind.  
 '48 LINCOLN CONTINENTAL hdp., with stock V-12 engine. Light green finish, premium w/w's; exc. cond. \$1200; will take trade. Dick Madden, 2925 N. 3rd St., Milwaukee, Wis. Phone FRanklin 2-4080.  
 '41 LINCOLN CONTINENTAL cpe., with '51 Lincoln engine; completely rebuilt. New carpets, uph., lacquer, power brakes, R. & h. Over \$2300 invested. Sell \$1250 or foreign trade. B. B. Mills, 200 Earlway Rd., Bristol, Tenn.  
 '41 CHRYSLER THUNDERBOLT with LeBaron body—one of 6 built. Chrysler's car of the future.



Push-button retractable hardtop, doors & windows. Sell or trade. Make offer. Walter J. Pettit, 14722 Eastwood Ave., Lawndale, Calif.

HANOVIA ALPINE SUN LAMP, Professional Model S-319A. Like new; complete with instruction data & goggles, etc. Cost \$169.50; will trade for antique & classic car literature in mint cond. worth same amount, or sell outright for \$95, shipped prepaid & insured. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.  
 BENNAT electric window air purifier & cleaner—brand-new in box. Excellent for all hay fever, asthma & sinus conditions. Eliminates smog & dirt from air. Cost \$69.50. Will trade for antique & classic car literature in mint cond. worth same amount or sell outright for \$50, shipped prepaid & insured. A. Ward Shanan, 2444 S. Orkney St., Philadelphia 48, Pa.

'36 LINCOLN Model K LeBaron conv. cpe. New top; uph. perf. Tires, etc. very good; very little body work. What have you? Sports or midgests? William M. Handley, 537 E. 3rd St., So. Boston, Mass.

'57 STUDEBAKER Golden Hawk with low mileage, many extras. Best cash offer or will accept MG-A, Jaguar, VW Ghia as trade-in. Gilbert O. Schmuck, R. R. No. 1, Sellersburg, Ind.

'39 CADILLAC conv. sed. Sharp; 90% restored. 100,000 orig. mi.; driveable anywhere. \$1100 cash; may trade on foreign or other classic. Interested parties only please reply. Raymond F. Cookston, 822 Wicklow Pl., Dayton 6, Ohio.

## SWAP

TIRES—4 Dunlops, 6.40 x 13 ww's. Perf. cond.; 1000-mi. use. Must have Michelen X or Road-speeds. A. Einstein Jr., 164 E. McCormick Ave., State College Pa.

## WANTED

FOR '31 THRU '34 AUBURN V-12: Need rear quick-change hubs & conv. cpe. top. Will pay top price & answer all letters. Jimmy Steele, General Delivery, Aztec, N.M.

FORD—1900-'15. Restored or in good cond. Mechanically & tires unimportant, but must be complete & orig. Write lowest cash price. H. W. Stewart, RD 1, Bellefonte, Pa.

'30 DUESENBERG—a restorable one. Joseph Einhaus, 517 Cowles Ave., Joliet, Ill.

COMPLETE DYNAMOMETER or power absorption unit to handle 200-300 hp. Must be reasonable. Taylor or Clayton preferred. Jim Townsend, 2545 Proctor St., Port Arthur, Tex.

'30 LINCOLN 5-pass. sed. in exc. cond. Joseph S. Schick, Indiana State Teachers College, Terre Haute, Ind.

STOCK KAISER-DARRIN DK-161 in good or better running cond. Give full details & price in 1st letter. James A. Pepling, 940 Summit Ave., Jersey City 7, N.J.

FOR '33 AUBURN Model 12-165 12-cyl. phaeton: need 4 "winged" hub caps, horns, front & rear bumpers, repair manuals, catalogs & owner's manual. Maj. R. T. Carrington, 412 Bossier Rd., Barksdale AFB, La.

PARTS FOR '35 FORD 4-dr. phaeton: Complete frame & bows for top. Also side wings & brackets, or what-have-you for same. Herman Muscat, 639 S. 2nd St., Dundee, Ill.

SHOP MANUAL, instruction book, service bulletins, specifications, sales catalog & any other literature to help restore '30 Cadillac 16-cyl. Fleetwood 4-dr. sed. J. John Hauck, R.D. No. 2, Box 95, Walnutport, Pa.

'38 CADILLAC Fleetwood conv. cpe.—V8, V-12, or V-16. Edwin W. Sims, 100 S. Colonial Dr., Hopewell, Va.

CASH for pre-war auto catalogs, show annuals, radiator emblems—any make. Highest prices for Rolls-Royce, Gardner, Peerless, Packard, Mercedes-Benz, Moon, Buick, all big-car literature. Lewis A. Mayer, Munith, Mich.

RING & PINION GEAR for '26 Pierce-Arrow Series 80. Bill Menz, 2016 W. Dravus, Seattle 4, Wash.  
 CATALOGS, BROCHURES & folders of Duesenberg, Cord, Auburn, Cadillac, Packard, Marmon, Lincoln, Stutz, etc., all classics. Also MoToR (N.Y.) Annuals & monthlies from 1920-'35. Name your own price. Sheldon J. Lewis, 61-33 213th St., Bayside, L.I., N.Y.

give your car that g-r-r-r-and feeling!

# NEW SMOOTH SOUND PLUS POWER!



*Grand*  
**Quiet-tone**

**HIGH-EFFICIENCY MUFFLERS**

**with Exclusive New TURBO-JET DIFFUSER**

Now you can enjoy all the power... the pep... the "purr-fect" performance of a straight-thru muffler with an acceptable sound level! Revolutionary "Turbo-Jet" diffuser design eliminates back pressure—gives maximum horsepower increase without sacrificing sound control.

**SEE YOUR FAVORITE DEALER**—he has a long-lasting, easy-to-install Grand "Quiet-Tone" to fit all cars.

Complete line of Dual and Header Systems for all V-8's and 6-cyl. Chevrolets—see your dealer today.

*Grand*

**AUTOMOTIVE PRODUCTS**

Dept. MT4, 2055 Ruby St., Melrose Park, Illinois

# STOP FAN DRAG!

with the NEW  
**FAN-O-MATIC**

MODEL 200

**Automatic FAN RELEASE**

**Makes fan a free-wheeling unit at speeds over 35 MPH\***

## INCREASES

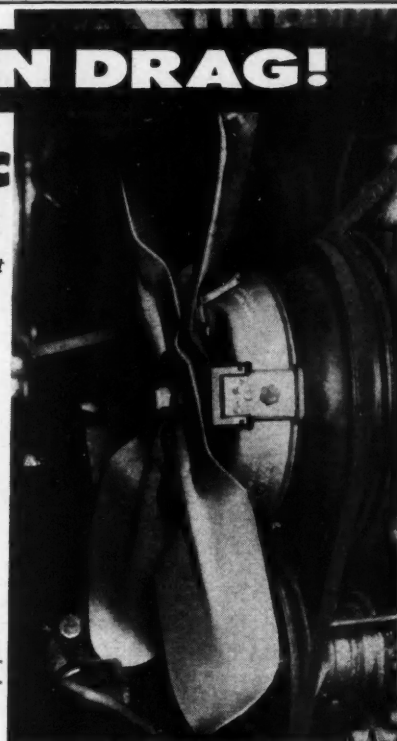
- **Available Horsepower** up to 20 H.P. at cruising speeds.
- **Gas Mileage** up to 3 miles per gallon... by actual road tests.
- **Acceleration** up to 10%... in official tests conducted at Indianapolis Speedway by U. S. Auto Club.

## REDUCES

- **Engine Noise, Vibration** for smoother, quieter riding.

Simple to install. Adaptable to most cars. Installation instructions with every unit.

\*Easily adjustable to higher or lower speeds



NOW AVAILABLE at Auto Dealers, Garages, Service Stations

Manufactured and Guaranteed by

**RADIATOR SPECIALTY CO., Charlotte, North Carolina**

In Canada: Radiator Specialty Co. Ltd., Toronto

MOTOR TREND/APRIL 1958 81



# WHAT'S YOUR CAR BUYING I.Q.?

THE ODDS ARE  
**12,000,000 to 1**  
YOU DON'T KNOW ALL  
THESE AUTO SECRETS!  
**DO YOU KNOW:**

## 1. How you can own a new car every year for \$200 or less?

Why not start with a 1958!

A sound investment formula... not a gimmick! Anyone can do it... AUTO SECRETS shows you how! Thousands successfully used this system last year... this formula is a copyrighted exclusive of AUTO SECRETS!

## 2. How you can own a second car or late model used car for \$100 a year or less?

Get a '53, '54, '55, etc. for approximately \$100 a year or less! Again, only AUTO SECRETS shows you how!

## 3. The wholesale prices of all 1958 American cars, trucks and accessories?

(including T-Birds and Corvettes)

### NOW 72 PAGES

Banks pay over \$30 for this service alone. They use this information to determine loan values of new cars. You need this same information to know how much you should pay. Without these wholesale cost figures, you're at the dealer's mercy.

## 4. How to save \$100's on financing charges?

(Cut those monthly car payments!)

Here is where many people pay up to \$300 too much for their car. Let us show you how to save this money!

## 5. How to save \$1500 or more on a brand new 1958 automobile?

Also included for your use are complete P.O.E. foreign car prices, best buys in '58, economy "musts" in operating your car, and the most complete specification charts available... from horsepower to legroom!

Subscribed to from Puerto Rico to Canada by scientists, engineers, doctors, lawyers and all types of industries.

**MAIL THIS COUPON FOR "AUTO SECRETS"!**

AUTO  
SECRETS  
1958

**AUTO SECRETS, Dept. L**

P.O. Box 331, Berkeley, Calif.

Here is my \$2.00\* Please rush me a copy of AUTO SECRETS on a money back guarantee.

Name \_\_\_\_\_  
Address \_\_\_\_\_  
City \_\_\_\_\_ State \_\_\_\_\_  
\*In Calif., add Sales Tax.

## Motor Sports continued from page 66

### MONTE CARLO RALLY

Each year the success of the Monte Carlo Rally, the classic long-distance winter event, depends very much on the weather. Cars, crews and roads have improved so much that in good weather the event is a promenade for the experts. The winner has to be determined after arrival at Monte Carlo through an elimination test which puts a premium on performance, driving skill and accurate time-keeping. This sometimes means that victory is won by fractions of a second after nearly 2000 miles of motoring.

This year the weather was what competitors and organizers alike always hope for; it was a terrific task to get to Monte Carlo at all within the time limits. For weeks before the event, snow had been falling on the most difficult portions of the routes, and had hardened into pack ice. During the critical first night, blizzards swept Europe, blinding drivers who already had their hands full maintaining the required 36-mph average on treacherous mountain roads. The results speak for themselves: of 302 who started from the eight starting points at The Hague, Glasgow, Rome, Athens, Lisbon, Oslo, Paris and Munich, only 59 checked in at Monte Carlo within the one-hour time limit at the end of 1800-2000 miles. Only nine of these got through without incurring penalty marks

for lateness at check points enroute. Only 38 of them finished the terribly difficult 680-mile elimination test which followed.

The event was a brilliant win for a works Renault Dauphine driven by Monraisse and Feret. Perfectly prepared for the event by Francois Landon, chief of the Renault competition department, it had a five-speed gearbox, modified 48-bhp engine, quicker steering, shorter rear springs to increase rear-wheel camber, and radius arms on the rear suspension as on Mille Miglia cars. Rear tires were equipped with spikes which gave it an excellent grip on the ice.

Second was an Alfa Giulietta sedan driven by two Frenchmen, third a DKW, fourth a Volvo, fifth a Sunbeam Rapier, the only British car to reach Monte Carlo unpenalized. Sixth was taken by two former winners, Gatsonides and Becquart, in a Triumph TR-3, the only competitors from The Hague to reach Monte Carlo. Seventh and ninth were taken by Alfa-Romeos, eighth by another Sunbeam Rapier, and 10th by a Ford Zephyr.

—Gordon Wilkins

(Our European Editor is one of the 264 entrants who didn't finish the Monte Carlo Rally, so he had lots of company. Why he didn't makes an interesting story that you can read about next month. Ed.)



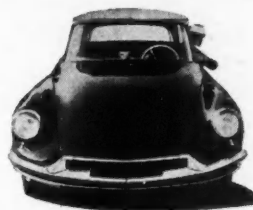
RENAULT DAUPHINE driven by Jacques Feret and Guy Monraisse was winner.



WINDING Col de Braus is one of the formidable obstacles on the elimination test after arrival at Monte Carlo. Fierce winter weather was another rally hazard and contributed to such accidents as befell Mrs. Rosemary Beaumont in a Ford Zephyr. Her co-driver, Mrs. Ann Hall, is still inside the upset car.

## Drive a Sports Car...

When a "Sports Car" man becomes a "family man" he inevitably turns to the car that best combines the precision performance he cherishes with the extra-space, safety, and comfort he now demands. The Citroën is made for such a man!



## and take the family along too...

You too will quickly recognize all of the unique engineering advances that distinguish CITROËN...as the first production automobile to feature as standard equipment:

**The Sure-Footed Control of Front-Wheel Drive:** The Citroën's roadability is legendary for flat, fast cornering around the sharpest turns!

**The new, sensational self-leveling ride of AIR-OIL Suspension...** "On every kind of surface traversible by four wheels, it absorbs shock and maintains stability to a degree never achieved before." (Road & Track) A whole new world of comfort and safety!

The extra margin of safety provided by self-wear adjusting, completely fade-free powerful Disc-Brakes...road tested over a million miles from the Alps to the Rockies!

With the quick reflexes of the CITROËN'S hydropneumatic system ready to do your bidding... Automatic Clutch and Gear Shift, Automatic Jack, you and your family ride with relaxed comfort in the "World's Safest Production Car." Economically European, Automatically American, the most exhaustively proven and widely acclaimed car in CITROËN'S distinguished automotive history.

## there's room for everybody in a CITROËN!



# CITROËN

ID 19  
.....  
DS 19

**CITROËN CARS CORPORATION**

300 PARK AVENUE, NEW YORK, NEW YORK • 8423 WILSHIRE BOULEVARD, BEVERLY HILLS, CALIFORNIA

WRITE FOR LITERATURE AND TECHNICAL DATA OR VISIT THE DEALER NEAREST YOU • PARTS AND SERVICE AVAILABLE THROUGHOUT THE UNITED STATES



**WINSTON** is the big brand on this range, ma'am—for filter and for flavor!

Once folks discover Winston, they just can't keep the news under their Stetsons! They go for the *flavor* because it's so clean and fresh — from a bright, clear blend of superb tobaccos. They like Winston's *exclusive* pure-white filter, with the smart cork-smooth tip. And, they like to share a good thing when they find it! You try 'em. Then you'll *know* why Winston is now way out ahead of the other filter cigarettes.

R. J. REYNOLDS TOBACCO CO., WINSTON-SALEM, N. C.



Now available  
in crush-proof box, too!

Smoke **WINSTON** America's best-selling, best-tasting filter cigarette!



